She Got $400.00 for a Half Dollar

I will pay CASH for OLD COINS, BILLS and STAMPS

Mrs. Sam Dowty of San Angelo, Texas, sold B. Max Mehl one-half dollar for $400.00

I PAID $200.00

to J. D. Martin, of Virginia, for Just One Copper Cent

"Please accept my thanks for your check for $200.00 in payment for the copper cent I sent you. I appreciate the interest you have given this transaction. It's a pleasure to do business with a firm that handles matters as you do. I wish to assure you it will be a pleasure to me to tell all my friends of your wonderful offer for old coins." **Julian D. Martin, Va.**

This is but one of the many similar letters we are constantly receiving. Post yourself! It pays! We paid Mr. Manning, New York, $2,500.00 for a single silver dollar. Mrs. G. F. Adams, Ohio, received $740.00 for some old coins. We paid W. F. Wilharm, of Pennsylvania, $13,500.00 for his rare coins. I paid J. T. Neville, of North Dakota, $200.00 for a $10 bill he picked up in circulation. Mr. Mehl paid $1,000.00 to Mr. J. E. Brownlee, of Heardmont, Ga., for one old coin. Mr. Brownlee, in his letter to Mr. Mehl, says: *"Your letter received with the check for* $1,000.00 *enclosed. I like to deal with such men as you and hope you continue buying coins for a long time."* In the last thirty years we have paid hundreds of others handsome premiums for old bills and coins.

All Kinds of Old Coins, Medals, Bills and Stamps Wanted

$1.00 to $1,000 paid for certain old cents, nickels, dimes, quarters, etc. Right now we will pay $5000 for 1913 Liberty Head nickels (not buffalo), $100.00 for 1894 dimes ("S" Mint), $8.00 for 1853 quarters (no arrows), $10.00 for 1866 quarters (no motto), $200.00 each for 1884 and 1885 Silver Trade Dollars, etc., etc.

Big Cash Premiums for Hundreds of Coins Now Circulating

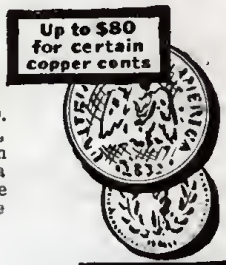
There are literally thousands of old coins and bills that we want at once and for which we will pay big cash premiums. Many of these coins are now passing from hand to hand in circulation. Today or tomorrow a valuable coin may come into your possession. Watch your change. Know what to look for.

Amazing Profits

FOR THOSE WHO KNOW

OLD MONEY

There are single pennies that sell for $100.00. There are nickels worth many dollars—dimes, quarters, half dollars and dollars on which big cash premiums are paid. Each year a fortune is offered by collectors for rare coins and stamps for their collections. The prices paid are amazing.



It Pays to Post Yourself on the Big Values of Old Coins and Stamps

Knowing about coins pays. Andrew Henry, of Idaho, was paid $900.00 for a half-dollar, received in change. A valuable old coin may come into your possession or you may have one now and not know it. Post yourself.

Huge Premiums for Old Stamps

Some old stamps bring big premiums. An old 10c stamp, found in an old basket, was recently sold for $10,000.00. There may be valuable stamps on some of your old letters. It will pay you to know how to recognize them.

Let Me Send You My Big Illustrated Coin Folder! It will Open Your Eyes! Use the Coupon Below!

Send the coupon below and 4 cents for my Large Illustrated Coin and Stamp Folder and further particulars. **Write today** for this eye-opening valuable wealth of information on the profits that have been made from old money. No obligation on your part. You have nothing to lose—everything to gain. It may mean much profit to you.

FILL OUT AND MAIL NOW!

To B. MAX MEHL
142 Mehl Building, Fort Worth, Texas.

NRA MEMBER U.S. WE DO OUR PART

Dear Mr. Mehl: Please send me your Large Illustrated Coin and Stamp Folder and further particulars, for which I enclose 4 cents.

Name .....

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City ..... State .....

B. MAX MEHL *Director Numismatic Co. of Texas.*
142 Mehl Building · FORT WORTH, TEXAS.

February

WONDER Stories

A GERNSBACK PUBLICATION

HUGO GERNSBACK EDITOR

"THE ROBOT ALIENS"

By Eando Binder

25¢

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THE MAGAZINE
OF PROPHETIC FICTION

Vol. 6, No. 9 | February, 1935

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ON THE COVER this month we see the fear-stricken populace flee in panic when the metal monsters roam the country, the army doing its best to destroy them. (From "The Robot Aliens" by Eando Binder.) Cover by the world-famous Paul.

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"I'll PROVE in Only 7 Days *that I Can Make* YOU a New Man!"

No other Physical Instructor in the World has ever DARED Make such an Offer

Photo by Joel Feder

By CHARLES ATLAS

Holder of the Title:
"The World's Most Perfectly Developed Man"
Won in open competition in the only National and International contests held during the past 15 years

I HAVE proved to thousands that my system of building powerful, big-muscled men begins to show real results *in only 7 days*—and I can prove it to *you*.

You don't have to take my word for it. You don't have to take the word of my hundreds of pupils who have added inches to their chests, biceps, neck, thighs and calves in only a few days. No, sir! You can prove for *yourself*—in just one week—by the change you see and *feel* in *your own body*—that you can actually become a husky, healthy NEW MAN—a real "Atlas Champion."

All I want to know is: Where do *you* want big, powerful muscles? How many pounds of firm flesh do *you* want distributed over your body to fill you out? Where do *you* lack vitality, pep, and robust health? Where do *you* want to take off flabby, surplus fat?

Just tell me, give me a week, and I'll show you that I can make a *New Man* of you, give you bodily power and drive, and put you in that magnificent physical condition which wins you the envy and respect of any man and the admiration of every woman.

My own system of *Dynamic-Tension* does it. That's the way I built myself from a 97-pound weakling to "The World's Most Perfectly Developed Man." And now *you* can have a big, balanced muscular development like mine in the same easy way.

No "Apparatus" Needed!

You begin to FEEL and SEE the difference in your physical condition at once, without using any tricky weights or pulleys, any pills, "rays," or unnatural dieting. My *Dynamic-Tension* is a *natural* method of developing you *inside and out*. It not only makes you an "Atlas Champion," but goes after such conditions as constipation, pimples, skin blotches, and any other conditions that keep you from really enjoying life and its good times—and it starts getting rid of them at once.

Let Me Tell You How

Gamble a stamp today by mailing the coupon for a free copy of my new illustrated book, *"Everlasting Health and Strength."* It tells you all about my special *Dynamic-Tension* method. It shows you, from actual photos, how I have developed my pupils to the same perfectly balanced proportions of my own physique, by my own secret methods. What my system did for me, and these hundreds of others, it can do for you, too. Don't keep on being only one-half of the man you *can* be! Find out what I can do for you.

Send for FREE BOOK

Charles Atlas—As He Is Today

Where shall I send your copy of "Everlasting Health and Strength"? Jot your name and address down on the coupon, and mail it today. Your own new "Atlas body" is waiting for you. This book tells you how easy it is to get, my way. Send the coupon to me personally.

CHARLES ATLAS
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115 E. 23rd St.
New York, N. Y.

CHARLES ATLAS, Dept. 102
115 East 23rd Street
New York, N. Y.

I want the proof that your system of *Dynamic-Tension* will make a New Man of me—give me a healthy, husky body and big muscle development. Send me your free book, *"Everlasting Health and Strength."*

Name .....
(Please print or write plainly)

Address .....

City ..... State .....

Learn MUSIC this Quick, Easy Way

...shortest road to friends, popularity, good times

THE interesting story told above is not just one unusual case. It is typical of the experiences of more than 700,000 other folks who have learned music — who have become socially popular—this quick, modern, easy as A-B-C way.

You, too, can learn to play—to entertain others—to pep up any party —just as these thousands of others are doing. And best of all you can accomplish this without the expense of a private teacher. You'll practically teach yourself—right in the quiet of your own home — in a much shorter time — and at only a fraction of the cost of the old-fashioned way.

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PICK YOUR INSTRUMENT

Piano	Violin
Organ	Clarinet
Ukulele	Flute
Cornet	Saxophone
Trombone	Harp
Piccolo	Mandolin
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Sight Singing
Piano Accordion
Italian and German Accordion
Voice and Speech Culture
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Drums and Traps
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Banjo (Plectrum, 5-String or Tenor)
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In order to show how easy and pleasant this course is, the U. S. School of Music has prepared for you a free Demonstration Lesson and Explanatory Booklet. No matter what instrument you select to play, the Free Demonstration Lesson and Booklet will show you at once the amazingly simple principles around which this method is built.

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U. S. SCHOOL OF MUSIC
862 Brunswick Bldg., New York City

Please send me your free book, "How You Can Master Music in Your Own Home," with inspiring message by Dr. Frank Crane, Free Demonstration Lesson and particulars of your easy payment plan. I am interested in the following course:

Have you ..... Instrument? .....

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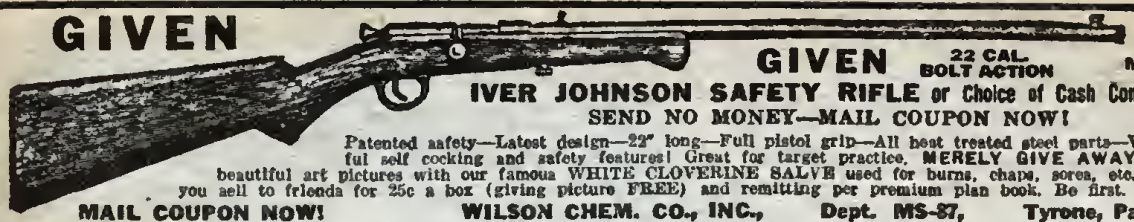
GIVEN



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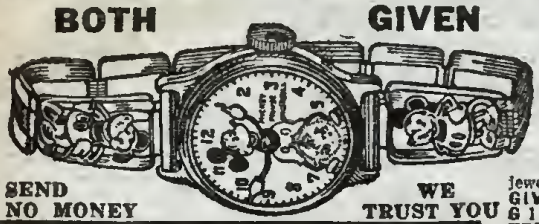
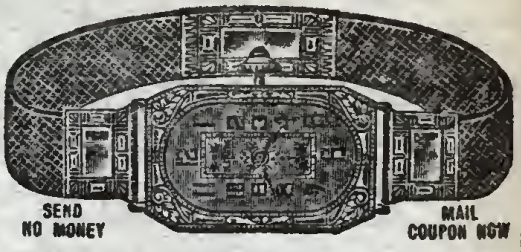
BOTH GIVEN



SEND NO MONEY — WE TRUST YOU

Choice of Cash Commission. BOYS! GIRLS! This Mickay Mouse adjustable link bracelet — chroma finish wrist watch in colors, or choice of this rectangular ahapa 7 jeweled wrist watch, GIVEN FOR JUST GIVING AWAY FREE beautiful colored art pictures with famous WHITE CLOVERINE SALVE used for chaps, burns, sores, etc., which you sell to your friends at 25c per box (giving picture FREE) and remitting per premium plan book. Big chance for good agents. Be first. MAIL COUPON TODAY!



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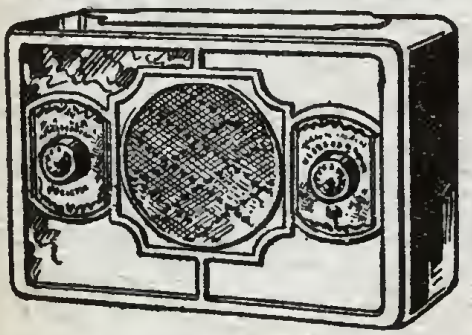

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COMPLETE with 4 tubes or BIG CASH COMMISSION

SEND NO MONEY—WE TRUST YOU—MAIL COUPON NOW!

Operates on either AC or DC, picks up police calls and regular broadcasts. Wonderful selectivity and sensitivity, fine tone, compact. High quality speaker. Shielded chassis and 25 ft. antenna. IT'S UNUSUAL. SIMPLY GIVE AWAY FREE beautifully colored art picture, with our famous WHITE CLOVERINE SALVE used for burns, chaps, sores, etc., which you sell to friends at 25c a box and remit as per new big premium plan book. We are reliable—40th yr. Be first.

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WILSON CHEM. CO., INC., Dept. MS-87, Tyrone, Pa.

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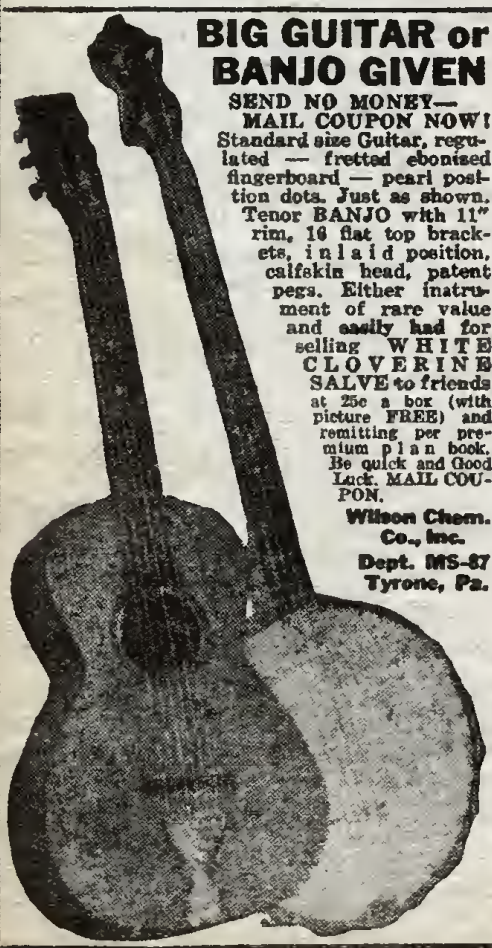

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Wilson Chem. Co., Inc. Dept. MS-87 Tyrone, Pa.

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1935 MODEL . ELECTRIC HEADLIGHTS

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or Choice of Cash Commission

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GIVEN

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THE increasing demand by our readers for new titles to be added to the SCIENCE FICTION SERIES has now been met. Six new books have been published and are now ready. Many new authors have contributed excellent stories which you will enjoy reading. A short summary of the new titles will be found below.

These new books, as usual, are printed on a good grade of paper, and contain brand new stories never published before in any magazine.

Each book (size 6 x 8 inches) contains one or two stories by a well-known science fiction author.

The Titles Are:

13—MEN FROM THE METEOR
by Panzie E. Black

In the unexplored heart of Australia lay the bizarre and cruel civilization of the meteormen. And into their midst came the two men from Outside, to pit their puny strength against the meteormen's power.

14—THE FLIGHT OF THE AEROFIX
by Maurice Renard

Renard is the H. G. Wells of France. With sly humor and yet grim reality he describes the most unusual and startling flight made by man. An entirely new type of transportation dawns upon the world in this masterly story!

15—THE INVADING ASTEROID
by Manly Wade Wellman

Into the vision of the Earth swam the huge but innocent asteroid. Mars, at death grips with the Earth, was far away; but the asteroid loomed ominous, menacing. Two men were delegated to solve the mystery; and what they found is revealed in this startling story.

16—IMMORTALS OF MERCURY
by Clark Ashton Smith

Under the sun-parched surface of Mercury, we follow in this story, the experiences of a man, reminiscent of Dante's Inferno. Every force of grotesque nature, the bitter enmity of the Immortals track him down in his wild escape to the surface.

17—THE SPECTRE BULLET
by Thomas Mack
and
THE AVENGING NOTE
by Alfred Sprissler

are two surprises for the lovers of scientific detective mysteries. Death strikes suddenly in these stories; clever scientific minds and cleverer detectives are pitted against each other in a duel with Death.

18—THE SHIP FROM NOWHERE
by Sidney Patzer

A trip to infinity is this unusual story; a mad chase across the infinite emptiness, tracked always by the avenging Marauder. Here is a story that deals with millions of years and billions of billions of miles.

CONTINENTAL PUBLICATIONS, INC.
99 Hudson Street New York, N. Y.

VOLUME 6
No. 9

WONDER Stories

FEBRUARY
1935

. . . . Prophetic Fiction is the Mother of Scientific Fact . . . .

HUGO GERNSBACK, *Editor-in-Chief*
CHARLES D. HORNIG, *Managing Editor* FRANK R. PAUL, *Art Editor*
C. P. MASON, *Associate Editor*

WONDERS OF YOUR BODY

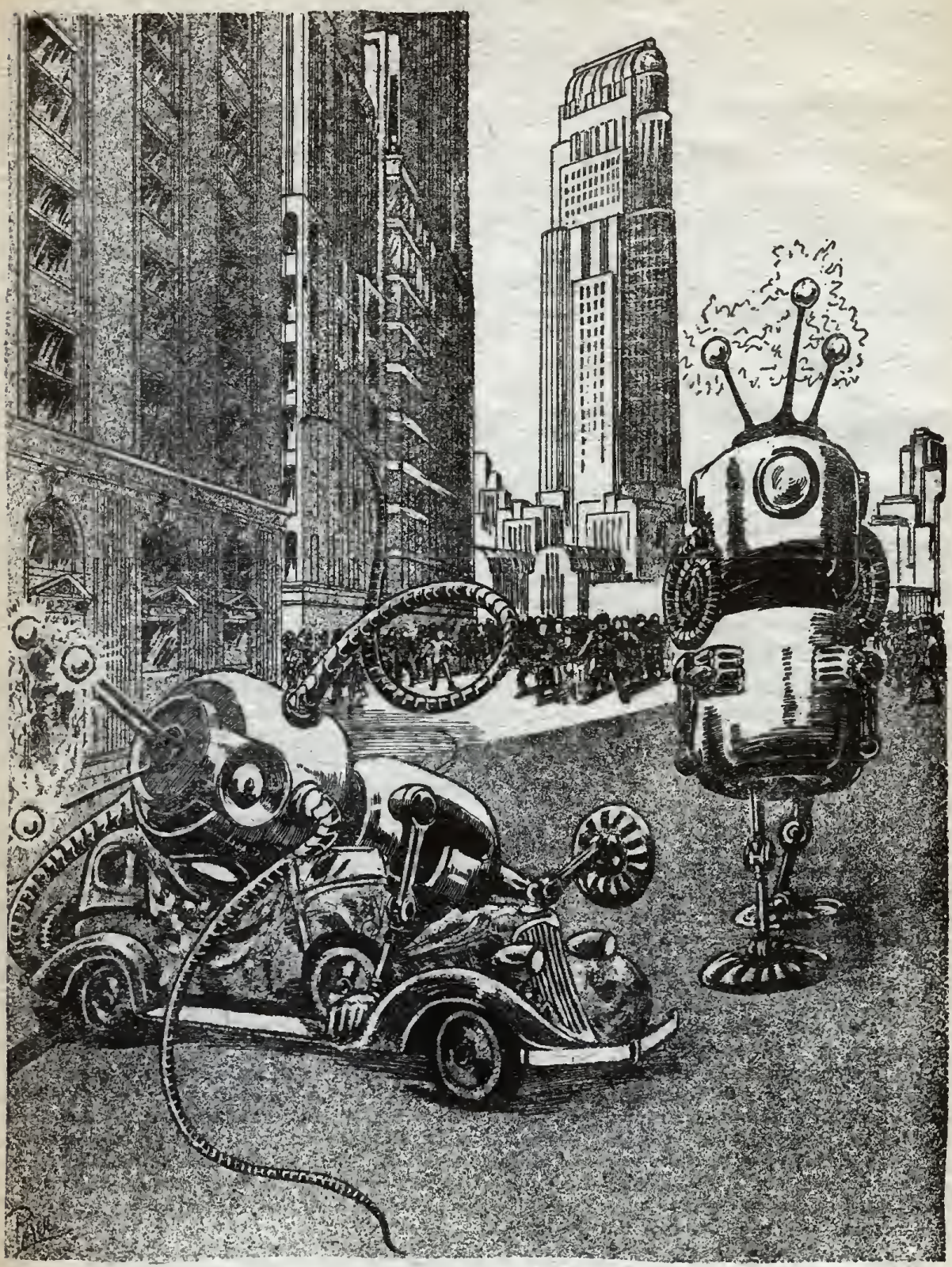
By HUGO GERNSBACK

THE wonders of the animal body are so complex and so far-reaching that we probably will never know all there is to be known about the subject. Indeed, for almost every part of the animal body, it would be possible to write many hundreds of volumes without anywhere near exhausting the possibilities. Take, for instance, the eye; it is one of the greatest creations that we can think of. It is, by the way, the one and only *perfected* television receiver and transmitter—so perfect that no engineer has, as yet, been able even to approximate the results achieved by the eye. We still have to use scanning discs and crude instrumentalities which dissect the picture-image and then reassemble it by pieces.

The animal eye, on the contrary, receives and transmits the image as a whole and, incidentally, does it in colors. Each organ has equally wonderful functions and, in many cases, even more complex than the eye. Dissecting any one of our organs, and using the highest microscopic magnification, still leaves us blind; because we know, as yet, nothing of cell life and its complexities, and why each atomlike smallest cell performs just as though it were itself a reasoning entity. Indeed, such a profound thinker as Thomas A. Edison was of the opinion that the human body is not a whole but composed of billions of intelligent entities—each steering its own course and living its own life, yet inseparable from the larger entity which we call the body.

When we come to the regulatory action of the various glands, which control and run the human machine, we must stand in awe; because each of these glands performs intelligent functions which, as yet, we only dimly appreciate. Thus, for instance, there is one gland which controls the growth of your body so that normally you will not become either a dwarf or a giant. Other glands take care of various bodily functions, all far too complex even to enumerate in a short essay of this type. But, to show how complex and marvelous these glands are, let us mention only one set, the sex glands, or those of reproduction. The male gland, which manufactures *semen*, does so unceasingly. Within a week, actually billions of male seminal cells are thus created, each one able to fertilize a female egg and start a new life. These seminal cells, called *spermatozoa*, are of such minute size that they cannot be seen except under a very high-power microscope. Yet, each of these tadpole-like spermatozoa carries the so-called *chromosomes*, which are thought to contain all hereditary influences. So small are they that more than 50,000 could be placed side by side and not cover an inch of space. Yet, in each, will be found not only all the racial traits but other characteristics—such as the color of the hair, the color of the eyes, the color of the skin, whether the offspring will be short or tall, whether the child will have straight or curly hair, whom the child will resemble, and—not to be forgotten—the transmission of certain diseases if the individual or his father before him had them.

That, however, is not by any means a catalog of all the hereditary traits. It would take several books the size of WONDER STORIES, merely to enumerate all of them. All incredible but true, and far more fantastic than the most impossible sounding science fiction.



(Illustration by Paul)

The metal monster toppled off balance directly onto the Mayor's car.

THE ROBOT ALIENS

By EANDO BINDER

● We know that human nature is a very weak force during crucial moments. Fear is a destructive power in itself and one of the chief weaknesses of man.

Science-fiction authors, since the beginning, have pictured the people of earth welcoming visitors from space with opened arms and literally giving them the keys to the city.

Would this actually happen in reality? Our author does not believe so.

Here is one of the most human, logical, and convincing stories we have ever had the pleasure to present. You will recognize the characters in the tale among your friends. You will smile ironically at their actions when faced with creatures from Outside. A thoroughly absorbing story.

● In the year 1955 A. D., the Robot Aliens startled a tranquil world. That it was a tranquil world may be judged by the many blessings that came upon civilization after the dreadful Depression of 1929-35. There came the miraculous rejuvenation of the United States in 1935, and its effect swiftly started the ball rolling and took the yoke of stagnation from the world. The unemployed had been put back to work; factories had opened full blast; currency had stabilized and circulated freely, and the threat of war had died to faint rumblings. But the latter had come about only after the powers of Europe had entangled for a brief month of such terrific devastation that they hastily made peace without enquiring closely who had won.

With the advent of a sensible division of the work of the world, the general scale of living advanced to a new high in the history of earth. Luxuries became the heritage of the average person. Almost without exception, everybody had comfortable homes, plenty to eat, a great deal of leisure time, and a surfeit of recreation. Even the overcrowded and miserable nations of the Orient metamorphosized to something saner and happier for their numerous citizens.

With this skeleton introduction, one can see that the world *was* tranquil, or at least should have been. But had all these great changes and benefits affected human nature? Had human *reasoning* advanced in like proportion? Did the new regime (as it may be called) make the mass-mind able to deal intelligently with a totally new and unprecedented phenomenon in the history of the world?

* * *

Bert Bodell gazed with undisguised admiration at ringed Saturn through his four-inch refractor on a clear night in the spring of 1942. He was one of that large and ever-growing group of "amateur astronomers" who took delight in observing, when weather permitted, the wonders and glories of the firmament, and who occasionally discovered new comets and asteroids before the observatories did. A young lad of twenty, it was one of his greatest delights to peer through the telescope of his own making. His secret ambition was to get his name in the astronomical records attached to some newly discovered heavenly body, as the custom was.

But this night in spring, the magnetic glory of beautiful Saturn — white and striped through the 'scope, xanthic-yellow to the naked eye—drew him to aimless staring worship. He was in the back yard of his home in Oak Park, suburb of Chicago. The 'scope had been installed behind the garage so that the lights from the house would not interfere with celestial observations.

Yet, absorbed though he was in drinking in the majesty of distant Saturn, when a blinding meteor flare caught the corner of his eye, he jerked away from

the eyepiece of his 'scope and turned to watch the sight. For a moment he was panic-stricken—the meteor seemed to be coming straight down!

His wondering eyes saw a white-hot object streak down to the horizon and plunge to earth in a southwesterly direction. Being a quick-witted youth, he pulled out his watch (fumbling a bit at that) and noted mentally the exact time down to the last second. As a conscientious star-gazer, it was only his duty to note the time, approximate length of visibility, and apparent source—which latter he judged to be the constellation of Aries.

Then Bert's mind began to whirl excitedly. The meteorite had landed somewhere near, assuredly in the northern part of Illinois. If it had landed near enough for him to be the first, or one of the first, to locate its position, what a thrill that would be! He might even get official recognition!

Imbued with an inspiration at least as great as the fanatical urge that sent the knights of old after the Holy Grail, the young amateur astronomer precipitately abandoned his 'scope (even neglecting to throw its canvas covering over it, which was almost a religious duty) and ran to the house.

"H e a v e n s! What's got into you?" asked Mrs. Bodell surprised as her son tore like a madman through the kitchen and hall to his bedroom and out again.

"Meteorite landed—direction of Aurora or Yorkville—somewhere around there—" gasped Bert both in excitement and from exertion. He jingled his car keys. "Mother, I'm going to chase it in my car!"

"Chase it—?"

"Locate it, naturally!" explained the boy at his mother's blank look.

"But, Bert dear! It's late. You'll lose sleep—"

"Hang sleep!" cried Bert dashing to the study and jerking an Atlas from the shelves. As he turned the pages to a map of northern Illinois, he called to his mother: "Stand out on the back porch, mother, will you?—and listen for the noise. If it comes, look at the clock and remember the exact time—the *exact time*—seconds and all!"

Mrs. Bodell complied, with a resigned sigh; if she did not humor him, he would nurse a grouch for days over it.

A minute later, Bert flew to the back porch where his mother stood silently. "Hear anything?—like a distant cannon or thunder?"

A negative somewhat quenched the boy's eager enthusiasm. It was already four minutes since the time of landing. No noise from the meteorite indicated that it had either landed very far away or had failed to explode on hitting the ground and had merely bored downward. In the former case, it would be so far away that he would not reach it for several hours; in the latter case, it would take much searching and concerted effort to locate it unless eyewitnesses had been reasonably near its collision with the earth.

"Aw!" muttered Bert to himself to raise his own hopes, "probably the traffic noise from North Avenue drowned it out." Thereupon, he followed his original intention and dashed to the garage, determined to at least make an attempt to locate the meteorite which certainly ought to be an important one by the size of its trail.

As he drove his new coupé down the alley to reach North Avenue, a loud voice hailed him from the back fence of a neighbor's yard.

"Hey, Bert! D'ja see the meteor?"

"You bet I did, and I'm going after it," said Bert, stopping the car. "What direction would you judge it — I mean, what town it lined with?"

"Waal," drawled the neighbor in hesitation, "I'd say Joliet or maybe north of that, near Yorkville. Course, I can't say how *far away*—"

From the roar of Bert's accelerating car came a faint "thanks!"

● Bert knew the highways of the Chicago area quite well and swung to the Aurora road, despite the neighbor's mention of Joliet which was farther south. At Aurora, thirty-five minutes later (risking a chase

by police motorcycles with speeds of seventy and eighty), he found a group of excited people in a main street all waving their hands and talking. To his queries, he got several contradictory answers, but Yorkville seemed to be the favorite direction.

Fifteen minutes of hare-brained driving down what was fortunately very good concrete highway brought him to Yorkville, a sleepy little rural town whose inhabitants had mostly been in bed and had therefore missed the meteorite. But one favorite corner was populated by "night-lifers" who were discussing the meteor vehemently, even belligerently.

Bert stopped the car at the curb. The Yorkvillers advanced upon him in a body, thinking him to want information either on road routes or tourist hotels. But Bert surprised them by asking where the meteorite had landed.

One long, lean fellow, with a dominant swagger, placed his self-assured visage in the window of the car.

"The meteorite? Why't fell straight south o' here—"

"Did not!" came a voice from the crowd at his back. "I tell you it was more to the east—I ought to know, I was standing right like this—"

"Straight south," repeated the first man, indicating that the stranger should disregard any opinions but his own. "Where you from? You a newspaper reporter?"

"No," Bert answered shortly. "By the way, did you hear any noise?"

A roar came from the crowd and after it broken bits of sentences by various seers and savants: "—like ten cannons"; "—like the world split in half—"; "—my ears're ringing yet—"; "—shook the floor under my feet"; "—mark my word, it was bigger than you think; I'll bet we'll read in the papers tomorrow it killed a hundred people—" etc. All of which indicated it had been a loud noise.

The sage individual, who had attached Bert for his own personal dependent, curled a lip at the murmurs behind him and bent a wise eye on Bert. "Bunch of liars—*them!*" He jerked a thumb backward. "It was a noise, all right, but real sharp and . . . . sudden-like; not like a cannon."

"Have you any idea how long after the meteor landed the noise came?" asked Bert hopefully, racing his engine as a warning that he would depart in a moment.

The man squinted his eyes sagaciously. "No more'n a minute."

Bert thanked him and roared from the spot, turning down the next county highway that went south. A minute!—that would make it only about fourteen miles from Yorkville! If it were that near, he still had a chance to be among the first there, more than likely the first with any astronomical knowledge.

In his high enthusiasm, the boy failed to reckon that he might wander up and down many country roads before actually locating the spot; but the gods were with him (perhaps they felt such interest and zeal should be appropriately rewarded) and he struck the trail just outside of Yorkville. A drawling farmer pointed southeastward and mentioned a road he might follow. On this road he met a trudging lad in his teens whom he obliged with a ride in return for worth-while information. It seemed that this lad had been romancing with a girl-friend on her back porch, and together they had seen clearly and later heard, the landing of the meteorite with some fear.

Dropping him off at his home, Bert came soon after to a cross-road where two farmers were conversing about the inevitable meteor. They steered him down another road which brought the impatient youngster to a brightly lit country home whose several shrill women-folk and screaming children were running about haphazardly as though they had received news of an invading army.

Hysterical answers finally convinced Bert that the meteorite had landed but a mile or so away with "a God-awful noise, sir!" They pointed out the direction with trembling fingers and asked if he would see that their menfolk had not been de-

stroyed or hurt, for they had gone there despite their frantic wives' pleas to stay home.

Bert brushed the perspiration from his brow, for the hysterical women had almost frightened him with their incoherent babble. He drove down a wagon road which should lead him to his destination. Two miles of the jolting road, then he saw a tiny flicker of light to his right across a wide cornfield.

In a fever of excitement, Bert stopped his car, clambered over a barbed wire fence, and trampled his way over young and tender corn shoots, guided by a flashlight in his hand. The ground was soft from recent rain and dragged — almost spitefully, it seemed—at his shoes. As he approached the light he had seen from the road, it resolved itself into a roaring fire, just beyond a small patch of orchard. At first, Bert was apprehensive of a blazing inferno, should the trees catch fire, but then he saw that the fire was a man-made one, around which several black figures stood conversing.

His first question, when he came close to the group which eyed him curiously, was: "Where's the meteorite?"

For a moment, there was no answer and Bert looked from one to the other in casual survey to see that they were all farmer folk—four grown men and three boys. The looks on their faces were oddly alike, being an expression of stupefied bewilderment.

Finally one of them answered: "Back there behind that knoll. Come along; I'll show you."

Bert willingly complied and noticed that two of the other men followed at a distance.

The man who had answered him spoke again as they ascended an untilled hump of the ground: "But it ain't no meteorite, mister. It's suthin' else!"

Bert was prevented from asking further by seeing the answer for himself, as they topped the low hill. There on the other side, a few hundred yards distant, was an object that brought an incredulous gasp to his lips and stopped him in his tracks.

What he saw was a metallic ellipsoid, half buried in the hard untilled ground, glowing a bright red and radiating heat, even as far as the hill where he stood! It was quite large, judging from the half sticking in the air, perhaps a hundred feet long, and its uniform *surface* was unmarred by anything resembling a door or window. *But the astounding thing was that it was not smashed or damaged in any way!*—that is, if the front half were like the back half, the former being unrevealed to the eye.

"What—what in the world is it?" Bert found himself asking in a hoarse voice.

The man beside him and the two who had followed and now stood with them looked at him and shook their heads. "It's more'n *we* know," the gestures plainly said.

Bert made as though to descend the hill, but one of the men grasped his arm. "Better not, mister; gets awful hot when you 'proach any nearer."

Bert nodded and swallowed painfully. The shock of what he saw and the heat that began to be felt as he stood there made him limp with wonder. As though by a signal, the party walked back to the fire which had been made not for warmth, but for light. Men hate to confront mysteries and talk about them in darkness.

Introductions went around. When Bert told of his coming all the way from Chicago, they looked at him in surprise. At the mention of a car, one of the men spoke.

"We been looking at this thing and talking about it for an hour. We ought to get the news to some authorities; seems this is suthin' for the police. Maybe you having a car, you'd drive to Joliet and tell the Chief of Police about this thing?"

Bert's answer was almost involuntary. "I'd rather not—er—I mean I'd like to be here when it's cooled off." He feared the police might detain him with numerous questions and thus keep him from returning soon enough to see all that transpired. "But if one of you can drive and wants to use my car—"

One of the youngsters eagerly volun-

teered and Bert handed him the keys. That he should so indifferently entrust his new car to the hands of a perfect stranger shows to what extent a great and awesome event can level humans to a state — momentary though it is — where they look upon persons newly met as old friends.

For the next few hours, Bert kept up running conversation with his new-found farmer friends, in which they all conjectured and aired opinions and nourished their excitement to high fever. From time to time, other farmer folk arrived who were greeted laconically and were shown the slowly cooling "meteorite" behind the hill. One and all they showed amazement and surprise, but neither of these emotions prevented them from sagaciously "explaining" to one another what it was all about.

Bert divided his time between talking to the others and running to the top of the knoll to look at the mysterious ellipsoid. It was not till the third trip that he noticed something no one had previously mentioned. From a different viewpoint —i.e., to one side of the knoll—he could see that the hinder part of the object graduated into a circular flange whose walls were parallel at all points. Although the angle was acute, by standing on his tiptoes he could see over the lower part of the flange and could distinguish, dark though it was, what looked like heavy mesh or honey-comb. His agile mind told him it was the discharging end of a multitude of rocket tubes. This, combined with several vague hints by the farmers that the *front* of the "meteorite" had seemed to belch smoke, settled something in Bert's mind.

CHAPTER II

The Alien Monsters

Lieutenant Arpy of the Joliet police, on night duty at the headquarters, yawned and looked at the clock whose steady ticking was the only noise competing with the snores of Policeman Murphy, which latter was a species of buzzing like a hundred bees. Lieutenant Arpy, who was pacing up and down like an insomniac, glanced at his peaceful Irish face more than once in exasperation; he didn't mind the man taking a cat-nap at the switchboard, but he could at least not rattle his confounded hard-rubber lips. At midnight, the officer had kicked him in the shin with a none-too-gentle toe and told him to straighten himself or he'd fall into the near-by spittoon. At one'clock, Arpy had awakened him to tell him of the meteorite (of which he had heard from a returning policeman who had been on beat) to which Murphy had grunted affected interest without fully awakening, and had thereby resumed his non-stop nasal duet—which noise probably accounted for the fact that Arpy had not heard the meteorite's landing. At two o'clock, Lieutenant Arpy advanced upon Murphy with the full intent of dousing him with a glass of water, when interruption prevented the righteous deed.

A farmer lad rushed in, eyes round with suppressed excitement, followed by a burly policeman who said: "Says he wants to see the Chief about that meteor thing that come down couple hours ago. Thought you'd like to hear what he's got to say, Lieutenant."

The latter nodded. "Chief's in bed nights, my boy," he said kindly. "I'm in charge; tell me about it."

"Well," gasped the boy, nervously fingering his shirt buttons, "that mete'r ain't no mete'r atall! It's round and smooth like a' egg, sir!"

Lieutenant Arpy looked suspiciously at the other officer. "What's this? Some funny joke—"

"Don't look at me, Lieutenant, I don't—"

"But . . . but it's true!" cried the boy almost tearfully. "We all seen it, my dad and two uncles and lots o' others, and we figured it was suthin' for the police. It *ain't* no mete'r; it's round like a' egg and it ain't smashed, and we don't know—"

"How far is it?" interrupted Arpy.

"Ten mile straight west."

Lieutenant Arpy decided to look into it; he ordered his under officer to get three men into the station's squad car and be ready to leave in a few minutes. He told the farmer lad to get into his car and lead the way to the "round thing like a' egg."

When everyone had left the room, Lieutenant Arpy allowed a gleam of sardonic glee to come to his eyes. He walked quietly over to the peacefully sleeping Murphy, slumped in the switchboard chair, and viciously threw a full glass of cold water in his chubby face.

"I'm going out, Murphy. If anybody wants to know where, it's to that meteor —ten miles west. *You* stay awake!"

With which useless advice, Lieutenant Arpy stalked from the room, more pleased with what he had just done than with anything that transpired later that day. For two years he had wanted to throw a glass of water at Murphy; this night of nights it had come to pass.

The police car with its five passengers followed the farmer boy out of Joliet along a decent gravel road that degenerated to a bumpy wagon trail before they reached their destination. Lieutenant Arpy whistled at the sizable crowd gathered around a fire that was being fed by newly chopped orchard trees. He whistled louder at the snatches of talk he heard, but he found himself unable to whistle when he looked at the "meteor" on the other side of the hill.

It was now a dull red and promised to be quite cool in another two hours. The policemen were able to approach within fifty yards and play their flashlights over its surface, finding it smooth like metal and with not a crack or seam anywhere. They silently circumnavigated it to find that the other side was the same, as the other side of our moon will prove to be when men conquer space and look upon it for the first time.

"Seventy blue devils!" Lieutenant Arpy muttered eloquently.

He thereupon began issuing orders to his men, not wanting them to think this had bewildered or stumped him. He sent one man to the nearest telephone to call headquarters and leave a message to the effect that he, Lieutenant Arpy, and his four men would stay with the mysterious object till relieved, when the Chief saw fit. He detailed two of the policemen to "keep watch," one on either side of it. The farmer folk who watched the policemen with silent curiosity, he disregarded entirely, considering them as neither adding to nor detracting from the pursuance of his duty.

He and the remaining officer sat down on the knoll, whereupon Arpy recounted with prideful rhetoric how he had heroically thrown water at "that damn' snoozer," who had innocently irked him for two years with his buzzing chorus of snores. But it was natural that the thing before their eyes should engage their talk when other topics had run out, and when the first grays of approaching dawn pushed back the veil of darkness, Arpy was speaking.

"Now I'd be willing to bet, Jones, that this here metal egg is some sort of new ship that some fool inventor took up and didn't know how to handle. Or p'raps it wasn't c'nstructed right in the first place, see? So he takes it up, gets maybe a dozen miles, and snap!—goes somethin' and he plops to the earth which he shouldn't've left without better tests, see?"

"Now what I think," argued the other called Jones with the confidence of ignorance, "is that it's a war machine! Yes, sir!—a war machine. Take Russia—d'you think fer a minit she's unpr'pared fer war? Not on yer life! She's got scientists who're makin' all kinds of things—poison gases an' bigger guns an' . . . . an' this thing *here*, which I think is a war machine—"

"Might be," agreed Arpy, willing to concede the point without inwardly crediting it much, because the more you opposed a man like Jones, the more confident he became! "Say!" he exclaimed, looking around, "the crowd is getting bigger right along. I'm betting the papers and radio will have this out by breakfast time."

● Lieutenant Arpy then noticed a young man who was dressed too neatly to be a farmer standing near them and looking at him in hesitancy. At the officer's glance, the boy came closer.

"Pardon me," said Bert, for it was he, "I . . . . I heard you talking about what you think that . . . . that thing is, and I—"

"Well, what d'you think it is?" asked Arpy somewhat coldly.

"A transatlantic rocket-ship!" answered Bert with a rush, all eagerness to impress them. "One of those ships that go from Berlin to New York in two hours—through the stratosphere. You've seen pictures of them, haven't you?"

"Oh—er—oh, yes," lied Arpy, unwilling that the boy should surprise him. "Sure, sure. So you think—" He bent his eyes on the ellipsoid as though weighing the matter in his mind.

"The pictures look just like that ship," went on Bert importantly. "Rocket tubes in back, and they must be in front too—for slowing down, you know. But one thing this ship hasn't got is wings. That puzzled me at first but I figure that since those rocket ships are in the experimental stage—only been heard of the last six months — they change designs whenever they want to."

Lieutenant Arpy was the recipient of an inspiration at that moment. He had a chance to solve the whole mystery before the ship cooled enough to look into it and before the Chief came. He got to his feet.

"How could we get in touch with the rocket-ship people?"

"Call up New York," answered Bert quickly. "They have an office there."

* * *

Professor Honstein of the Yerkes Observatory, Williams Bay, Wisconsin, swore bitterly while his assistant helped him unload the photographic plates with which they had meditated catching the image of Saturn.

"Damn! Damn! *Damn!*" cried the professor, his voice echoing with a hundred more "damns!" in the domed telescope pit. "*Out* with 'em, man! Ruined as they are, we don't have to be careful with them!"

The professor threw a switch with a savage gesture.

"Peabody, I tell you it's . . . . it's damn' provoking! Of all the times for a cursed meteorite—and of course it had to be a *bright* one—to flare across the ecliptic. Why—*why*—couldn't it have chosen the rest of the sky! There's plenty of it—"

He had the habit of emphasizing words with a shake of his head, and after this petulant soliloquy, he jerked his head in an explosive "damn!" so violently that Peabody feared for the continued well-being of his neck.

Professor Honstein pulled out his watch and conquered his peevishness at the same time. "All right, Peabody. We'll load again; it's only 11:30."

By one o'clock, the professor had gotten several plates of Saturn and retired. The meteor had quite slipped his mind with his interest in the work and the unretentive qualities of his memory . . . . he being what they call an "absent-minded professor." But not so Peabody; he had been partially blinded by the bright meteor as it flashed from almost straight above, grew like a super-fast comet, and then swung like a lightning bolt to the south. It piqued his curiosity, and at four o'clock, he tuned in the Early Worm Radio Reporter. What he heard sent him dashing to the professor's room.

"Meteor?" repeated Professor Honstein vaguely, sitting up in bed and listening to Peabody's incoherent words. "Ah—the meteor! What's that nonsense you said?—not a meteorite but a metallic ellipsoid half buried in the ground, heated white-hot and slowly cooling?"

Peabody nodded.

"Well, let me tell you," said the professor with a flash of the previous evening's anger, "I'm going to sue whomever that thing belongs to for ruining those plates. Now let me go back to sleep."

* * *

Chief of Police Saunders of Joliet stroked a smooth-shaven chin with por-

tentous gravity as he looked at the mystery ship from the top of the knoll and at the same time listened to the laconic voice of Lieutenant Arpy. Chiefs of police always carry that air of wisdom and poise that becomes a man, so important in the social affairs of civilization. Chief Saunders had a particularly sagacious and knowing mien; one could not look at his face but think immediately that he must be possessed of illimitable knowledge. At the moment, his countenance, with its undisturbed *sang-froid,* camouflaged a brain that started a dozen thoughts and tumbled them together in the center of his cranium without a single survivor. A close observer might have seen the vacuity in his eyes that betokened a bewildered pound or so of gray matter.

"The rocket people," finished Lieutenant Arpy, "deny having anything to do with it."

"Oh, naturally they'd deny it," said Chief Saunders when Arpy stopped and made it necessary for him to say something. "Why, if it was their ship, they could be arrested and fined for endangering human life! You see, Lieutenant?"

"But, Chief," added Arpy cautiously, "it's quite a jump from New York, where those rocket-ships are supposed to land, to *here.* Kinda unreasonable to suppose they'd *accidentally* go another thousand miles!"

Saunders nodded; within him he wondered where Arpy had ever got the idea of the rocket people and how he knew so much about them. It was not like Lieutenant Arpy to know much about such advanced matters. The Chief began wishing to himself that the responsibility of attacking the mystery had fallen to someone else. Somehow, the partially buried ellipsoid struck him as a hard nut to crack. How to get into it in the first place? He had himself walked all around it in the brightness of the morning sun and had seen no way of opening or entering the thing. It was exasperating, to say the least.

It was eight a. m. Already a horde of scribbling reporters had arrived and almost besieged Chief Saunders, wanting to know—for their papers—what the thing was all about, as though he should know. Already the news would be headlining around the country, for mysterious ships do not streak from the sky like meteors every day, and the accounts would say: " . . . a mystery as yet, but Chief Saunders of the Joliet Police Force is in charge of investigation and promises a comprehensive report . . . "

The unfortunate Saunders almost hated the policeman who came up after eight to report that the outside of the ship had cooled sufficiently for human hands to touch it. *Now* what to do? he asked himself in misery. Yet that imperturbable look of benign wisdom on his face never left; it had grown there permanently, though the mind behind it had never in his whole lifetime justified the expression.

But Saunders, at the crisis of his life (he who had battled desperate gunmen from behind brick walls at two hundred yards with belching guns but aimless bullets) was spared taking the initiative.

● A voice, shouting from the foot of the knoll, electrified the crowd which mainly centered at the hilltop, "I heard a noise! *I heard a noise inside this thing!*"

Unbelievable as it sounded, it proved true, for not a minute later there was a ringing and clanking from the ellipsoid that everybody heard. Yet the thing itself did not move; it came from inside, that noise!

There are times when a crowd hovers between two things induced by momentarily inexplainable things: breathless but sturdy suspense, or panicky flight. At the clangor from the mysterious ellipsoid, only one thing perhaps prevented the latter procedure. A little boy no more than seven pointed at it and asked in a shrill voice of his father, "What makes it jingle, Dad?"

This eased the tension and quelled the innate emotion of fear in the massed group.

Chief Saunders might have made an ass of himself, for the world to read

about, by approaching the now quiet ship and shouting loudly, "Who's in there?" But events moved too swiftly after that.

Of a sudden, a new noise was heard, again freezing the crowd, a noise like the highest pitch of an organ, or like the harmonic bellow of a steamship whistle, or like a dentist's drill, or like an electrical generator, whichever the reader chooses, as they were all reported along with dozens of other analogies.

But the after result of the noise they all agreed upon; a circular section of the ellipsoid's wall, perhaps ten feet in diameter, abruptly parted from the rest of the surface and toppled with ringing tones to the hard ground. Yet it was not a "door" or "hatch" because the edges were uneven and ridged unsymmetrically, indicating that the piece had been *cut* or otherwise severed from its surrounding material.

This, then, positively proved that someone—perhaps none of them at the moment thought of it as *something*—was inside and was coming out! How can one describe with what avid interest and, to be frank, fearful apprehension, the people waited for the dénouement of this mysterious drama that had started with a flaming meteor descending from the heavens? It was the grand moment for which many had gone sleepless and practically unfed.

Then it came—first a series of flickering movements in the shadowed aperture as though mirrors were being uncovered, then a shiny white bulk which emerged slowly and ponderously. It straightened up and stepped from shadow into sunlight so that all could see it clearly. Thus human eyes had the first glimpse of one of the Robot Aliens.

With a low moan, the crowd quivered like jelly, reformed into streams like melting butter on a table, and radiated away from the spot. Fear—blind, unreasoning, human fear, the emotion that supersedes all other human emotions—drove them away with but one thought: to escape that utterly monstrous apparition beside the aperture of the metallic ellipsoid.

Only four persons (besides the police who at such times are held back by a sense of pride) held their ground and dared to look twice. Then they looked at each other, as if questioning individual reasons for staying, and moved together when the people between them melted away.

Bert Bodell, with the individualism his nights of amateur astronomical pursuits had given him, was not swayed by the crowd emotion. Professor Honstein (for his curiosity had gotten the better of him) was too pedantic to yield to panic. Peabody had a strong mind—when the professor was around. And the little boy of seven who had once shamed his elders, and who had been deserted by a weak-minded father in the rush, had the courage of innocence.

With them stood Chief Saunders, his facial expression half broken down to an idiotic mixture of disdain and terror, and Lieutenant Arpy, who trembled so violently that his puttees came together in regular clicks.

The monster stood motionless and silent, seeming to watch the precipitate departure of frightened humanity. It was a metallic creation, twelve feet tall and faintly suggestive of the human form, but having instead of head and torso, two equally large bulks, one of which must have been the "head," for it had unmistakable "eyes" and "ears," but no mouth or nose. From the upper of the two bulks, or the head, came four long "arms" so many-jointed that they might be called tentacles, coiled in repose against the body. From the lower "torso" came four shorter appendages, jointed twice and reversely; these were folded against the body and terminated in a grotesque parody of the human hand. For support and locomotion, the monstrous creature had two appendages jointed but once and apparently similar in purpose to human legs, ending in broad, flat plates of metal.

Its composition seemed entirely metallic, silvery in color, with here and there at the joints a blue or blackish metal. From the rounded top of the upper bulk ex-

tended three long, thin rods terminating in balls. It was later observed that whenever the creature walked, sparks of electricity leaped from ball to ball of these rods, accompanied by a loud crackling noise.

This was the nightmarish object that the group of men faced and watched as silently and motionlessly as the metal monster itself observed them.

But when it suddenly leaned forward and ponderously moved a leg toward them, the humans paled and gasped and trembled. And when the metal monster proceeded to move toward them, an incredible walking machine, they, one and all, without exception, ran in fright. Their bravery had been but a shade greater than that of the rest of the crowd, and, in fact, proved less than that of several newspaper reporters who had clambered orchard trees and from such vantage, observed the metal monster and scribbled down its description and movement with shaking hands.

CHAPTER III

The Army Attacks

● "This is something new," said Captain Pompersnap of the Illinois National Guard. "Ten years ago, my men were picketed in southern counties to pacify rioting miners, or in central parts to quell strikers, or in northern parts to keep the milk farmers from raising Cain. Now I'm to take my men and surround a strange sort of airship which seems to have been run by people disguised in armored suits —"

While the handsome captain shook a puzzled head, his over-officer, Major Whinny, explained, "In these modern times of armed peace, Captain, we must not be lax. If this wingless ship and those 'metal monsters,' as the papers have it, are a threat to the independence of our great nation, then we must take care that they are destroyed."

"Is it as serious as all that?" asked Pompersnap. "I had an idea it might be some publicity stunt, advertising a new wonder alloy, or just some clever inventor trying to introduce his new mechanical robot to the world by means of headlining."

"Might be," agreed Major Whinny with a small chuckle. "For all we know about it as yet, it may be something of that sort. But orders have come from Washington—from the Secretary of War, mind you—for us to picket the thing in case it turns out more serious. Personally, I think that asinine Chief Saunders of the Joliet Police is a yellow-streaked moron—saying that the first mechanical man which stepped from the ship tried to attack him. At least, I'd rather believe the *Evening American* account which stated that the robot, or mechanical man, or whatever it really is, merely took *one step* forward and then turned around and went back into the ship. But Saunders lost his nerve and turned the whole thing over to the Federal authorities and that's why you are going there."

Captain Pompersnap shrugged his shoulders. "Am I supposed to try to talk to the damned things?"

"No, Captain. You just picket and keep strict guard so the—the *things* don't gallivant around. Washington is sending a Secret Service man there to solve the mystery."

A little later, a long line of transport trucks left Fort Sheridan on Lake Michigan and wound its way to the southwest, loaded with National Guardsmen and their paraphernalia. Captain Pompersnap ruminated during the three-hour trip and felt foolish. Beyond a doubt, he reflected, it would eventually turn out to be some elaborate advertising scheme. Probably United Alloys had built the ship and armored suits out of a new and amazingly tough metal, had then dashed it groundward to demonstrate its strength, and would soon announce the prices per ton and per square yard. Then the sassy reporters would indulge in a bit of sarcasm and tell the public: "Captain Pompersnap and his men, fully armed and prepared for anything short of war, found the only charge they could make was one

for which United Alloys would extend them thirty days credit . . . "

It was the morning of the third day after the "meteorite" had startled all of northern Illinois and parts of Wisconsin, Iowa, and Indiana, when the National Guard arrived and forthwith set up camp, to see that a possible menace to the peace of the nation be effectively ensnared. With military precision, the soldiers set up their canvas tents, distributed their trusty rifles, and put a ring of "guards" around the mystery ship.

Lieutenant Arpy of the Joliet Police arrived before noon, emissary of Chief Saunders who had certain weighty duties that prevented his coming. He sought out Captain Pompersnap immediately, finding him at the top of the knoll overlooking the landing place of the ship.

"What d'you think of it?" asked Arpy when introductions and preliminaries were over.

"Pretty clever, I'd say," answered the captain.

"Clever, you mean—er—"

"Of course it's clever," repeated Pompersnap with firm conviction. "Obviously, it's sensational advertising, some big steel company."

Arpy removed his hat and scratched his head slowly, turning his gaze to the ellipsoid as though to verify for himself the captain's statement.

In the twenty-four hours since the first metal creature had stepped from a hole in the ellipsoid's hull—thereby frightening a hundred people as they had never been frightened before—several new developments had come about. The original monster had proved to have two companions exactly like itself, one of which, however, had had its legs so badly smashed that its locomotive powers were destroyed. A timid and distant crowd of humans—using binoculars and tensed to the last man to run at a second's notice—had seen the two undamaged metal monsters lug out the third and set it upright on the ground. Then they had brought out from the interior of the ship various complicated and small devices with innumerable markings and controls. These they all three had played around with all day, using their multi-jointed tentacular arms and the human-like hands with amazing dexterity.

Then at night, the metal monsters had again entered the ship and brought forth a tripod affair whose spherical summit cast a brilliant white light all around them, so that their queer manipulations could go on uninterrupted. By morning, the ground just outside the ship was littered with a motley array of unnamable instruments, most of them metallic and mirrored; some containing jars of colored solutions.

In all that time, the mysterious creatures had taken no direct notice of the humans silently watching them, although, at times, an uncanny hinged eye would fasten to the hilltop and apparently take in the scene.

Arpy thought over Pompersnap's odd idea in his slow, incoherent way and finally ventured to remonstrate. "But, Captain, what the devil would a steel company be having them machines playing with a lot of crazy toys for?"

Pompersnap shot him a scornful glance. "For the effect, man!—and to drag out the mystery so that it'll be headlined longer."

"Is that why the gov'ment sent you here?" asked Arpy.

"No," snapped the Army man, flushing. "We are here because your Chief of Police thought this was war-stuff and was afraid he was risking his precious life. Why, take a look! There ain't a weapon around that ship."

Arpy muttered some sort of an agreement, but thought it proper at the moment to add, "I'll tell you, though, Captain, them things is ornery-looking from closer up. If you'd ha' seen that first one stepping toward you like a skyscraper on legs, you might kinda—sorta shiver!"

Captain Pompersnap expanded his manly chest at these words and allowed a look of noble bravery to come over his handsome features. "Lieutenant Arpy, I see you don't know us men of the Army. We would fight the Devil himself! Don't you ever get the idea that those things,

just because they're big and strong looking, would *scare* us. Nothing scares us."

"Well, when you get down to it, fellows like us," said Arpy, "soldiers and police, are above the average that way. Take us and our criminals now—"

From this congenial start, the two brave minions of law and order began a delightful conversation in which each considered it a point of honor to match stories of bravery and prowess. Captain Pompersnap had in reserve tales of the riotous times of the decade before when the working classes had been inflamed because of the bad times. Lieutenant Arpy had the vast field of criminology from which to extract proofs of his fearlessness and undaunted spirit.

● In the afternoon, the Secret Service man arrived from Washington — Colonel Snoosharp by name. He had a secretive air about him and his pursed lips seemed to betoken that he had much to say, only that duty withheld him from revealing important secrets. He drew Captain Pompersnap away from the camp to have a heart to heart talk with him.

"Now, Captain," he began, "this whole affair may prove more serious than anyone thinks. You are under my orders—I have the proper authority from the Secretary of War—and first of all increase your sentry line, for it is altogether too skimpy. Furthermore, set up your machine-guns and—let's see, have you any larger pieces?"

"Why, no, except grenades and tear bombs. But, good Lord! What—"

"Now listen to me," went on Snoosharp in a low, rapid hiss as though spies might be about eavesdropping, "give your sentries grenades and impress upon them they must be alert at all times. In fact, all your men must be on their toes. You really should have some heavier pieces—well, later for that. Captain, detail me a party of ten armed men who will accompany me —I was told to clear up the mystery and I'm going to approach those metal monsters or robots and attempt to communicate with them. And for Heaven's sake, keep the people back; there's at least ten thousand of them around here."

Captain Pompersnap picked nine men and himself joined the colonel. The crowd immediately sensed that something important was occurring and only the stern line of bayonet-armed Guardsmen kept them from pouring closer.

At the top of the knoll, the party formed in military step, two rows of five each, with Colonel Snoosharp in front. Halfway down the slope, the captain's voice barked out: "Present arms!"

In this formidable fashion, the party reached the foot of the knoll and halted. Not twenty yards away was the nearest of the three metal monsters. Long before they had come up, the Robot Aliens had ceased their mysterious work with the queer instruments, and two of them had faced directly about.

The humans, seeing the creatures close up for the first time, felt a vague dismay—even a little fear—sneak upon them. Ominously quiet and inhumanly proportioned, the Aliens struck a note of unreasoning terror in the human heart of flesh and blood. The ground beside the ship had been trampled hard as though steam-rollers had gone over it, attesting that the creatures had terrific weights. Mechanical eyes, with lurking, unfathomable depths, peered unblinkingly at the puny men.

Colonel Snoosharp could only bolster up confidence by periodically shifting his eyes to the shiny bayonets back of him. Captain Pompersnap remembered suddenly Arpy's words: " . . . you might kinda—sorta shiver!" Several of the bayonets were dancing in the sun from hands that trembled.

Pompersnap nudged the Secret Service man who had fallen into a trance of enervated staring. Snoosharp started and licked dry lips. Then he shouted out at the motionless Robot Aliens: "Who are you?"

Beyond a click from mechanical ears that turned funnel-shaped objects toward them, there was no sound from the metal monsters.

Snoosharp tried several different languages without success.

Suddenly the Robot Aliens retaliated. The foremost raised one of his tentacular arms and stretched it out till it pointed skyward. Holding it there, a second tentacular arm swung in circles, paused, swung again, and twice again swung and paused. Then the tentacular arms fell limply into the coils with a faint sound of whirring machinery and rubbing metals.

The captain and colonel, equally pale and disconcerted, looked at each other helplessly. The creatures could not speak or understand, and gesticulated in a quite incomprehensible way.

"I — I think," whispered Snoosharp hoarsely, "we'll just have to give it up—"

Captain Pompersnap responded with alacrity. "Right about face! March!"

Then a surprising thing happened. The foremost metal monster, the one which had gesticulated, moved forward toward the retreating men, waving all its appendages violently. As it moved, the three prongs on its "head" sparkled with electricity—a sound which associated itself in the soldiers' collective mind as machine-gun fire.

In a blind panic at hearing this dreadful crackling, the Guardsmen, without an order from the captain, who was incapable of giving orders at the time anyway, fired at the Robot Alien and then ran precipitately. But neither the captain, nor yet the colonel, were last to reach the hilltop. The former, completely unrattled, shouted for his men to "repel the attack," at which several soldiers flung their grenades. None reached down to the Robot Alien, which now strode quite rapidly up the slope like a nightmare horror, throwing all the human watchers into a frenzy of blind fear. Scattered bullets flew through the air, and a few rang upon collision with hard metal. In a moment of sanity, Captain Pompersnap tried to rally his men, but they were absolutely deaf to his commands. They ran, pausing to shoot at times at the twelve-foot tower of metal that lumbered along behind.

The crowd on the other side of the knoll, hearing the shots and explosions and hoarse cries, screamed in mortal fear and trampled over itself without thought and poured across the fields away from the scene of action.

The Robot Alien gained the top of the knoll and then stopped. Clicking eyes swept the scene—the black of scurrying humanity, the brown of moving soldiers, some of whom stood their ground, and the still bodies lying on the ground, unfortunates who had been swept off their feet and crushed. A hand grenade arced from a resolute-faced man in khaki and exploded not a foot from the machine-man's feet. Beyond a slight swaying and a short backward step, the metal monster took no notice. It stood there for a long minute and then slowly turned and descended the knoll back to its fellows.

* * *

It will be easily understood that the reports that reached the public ears and eyes were vastly distorted. In the main, the individual reporters had used their imaginations and painted the Robot Aliens as malign enemies of mankind, armed with terrible weapons. One reporter said it had long metal whips with which it had scourged and beat people during that hectic affair. But it is less easily credited that the official reports should be prevarications designed to protect the honor and name of two men—Captain Pompersnap and Colonel Snoosharp. They had to fabricate a story of attack by the vicious Aliens to cover their own cowardly panic and shameful lack of competence in such a crisis.

Not only was Captain Pompersnap an arrant weakling (even Lieutenant Arpy had sensed that, listening to his bombastic oral exploits) but he was also an accomplished liar. Worst of all, Major Whinny (a political officer and therefore incompetent) believed him, sympathized with him, and promised retribution.

Colonel Snoosharp's report to Washington by telephone aroused the whole War Department, and due to the conflict-

ing newspaper accounts and the still more garbled radio effusions, there was none to gainsay that "the Metal Monsters are inimical to human life, dangerous to the continued peace of our glorious nation, and absolutely void of human feelings or sympathies." The government, with its characteristic s a g a c i t y and wisdom, promptly ordered the territory under martial law and transmitted secret orders to Major Whinny to destroy the enemy.

There had been thirty people killed, most of them by the panic of a fleeing mob, the rest by stray bullets, and some thrice that number injured in various ways. Yet all the Robot Alien had done was walk up the slope and stand at its summit for one minute! Truly it was a formidable destroyer of human life!

CHAPTER IV

The Panic in Chicago

● Major Whinny, small and wizened, thin-voiced and arrogant — and incidentally allied with powerful political interests — sent the entire Fort Sheridan soldiery to the spot, along with numerous small guns and several larger pieces of ordnance. In wartime he would have made one of those commanders who run hastily over important data, disregard perfectly obvious precautions, and pour a flood of cannon-fodder at the laughing enemy. He was the type to turn down advice not to his liking and to run his one-dimensional thoughts along its sole single track—in other words, as fitted for his position as most "political" choices are in any other position.

He did get advice, too. There were sane and intelligent people who saw from the conflicting reports that it was quite possible that imagination had made the Robot Aliens so destructive. One of Captain Pompersnap's own men, a quiet-mannered private who had calmly climbed a tree of the orchard during the excitement and watched the whole thing with unprejudiced eyes, came to him at the news of armed attack and declaimed the action as unwarranted. Major Whinny listened to only half his speech and then had him arrested for dishonorable action (he had climbed a tree, it will be understood).

So, by the afternoon of the fourth day, elaborate preparations for attack were made. Troops were stationed at all points of the compass in a huge circle of three miles, armed with one-pound cannons. Artillery crews were stationed farther back with four- and six-inch pieces and enough ammunition to bomb all Chicago. The flying corps was also scheduled to bombard after preliminary small shell fire. It was to be quick and decisive.

"What I'm worried about," admitted Major Whinny as he looked out the window of a farmhouse which he had commandeered as his temporary headquarters, "is whether they have any weapons more dangerous than that one you mentioned; I mean any guns or bombs."

"I suspect they might have, sir," commented Captain Pompersnap. "But I only know definitely of the one that sparkles like rifle fire and makes guns go off accidentally—which, as I've said before, accounts for so many wounded by stray bullets. It's obvious that my men could not have shot those bullets voluntarily."

Major Whinny nodded in agreement. He believed it as gospel truth that the rifles had been fired by foreign agency; in fact, so did the captain—almost.

"I am prepared to say, though," the major said reflectively, "that those numerous instruments they had strewn about and were assembling are sure to be some form of lethal weapon."

"In that case, our sudden attack will catch them unprepared," cried the captain eagerly.

A helicopter plane landed in a plowed field and its pilot came in with a salute.

"I beg to report, sir, that there is no particular sign of activity from the enemy. They are just outside the ship engaged in fingering certain instruments I can't define, sir, and seem oblivious to anything else."

Major Whinny waved a finger for him to go.

"They are together and unsuspecting, Captain. Let's give it to 'em!"

The one-pounders burst out into rapid fire, which at first missed its mark but gradually crept closer as observation planes above radioed range figures. At the bursting of shells and the flying of clods and shattered rocks, the Robot Aliens jerked to their feet (except, of course, the one whose pedal extremities had been previously mangled) and gazed about. When the explosions of larger shells joined those of the one-pounders, the two standing creatures hastily tugged at their helpless companion and started to carry him into the ship. Then the first direct hit came: a one-pounder tore a hole at their very feet. Another struck the ship and tore a small fragment of the hull away.

At this alarming episode, the two whole-bodied Aliens abruptly left their companion and raced away from the ship. For the first time, human eyes saw with what amazing speed they could move. At the rate of a slow automobile, legs flying like pistons, the two metal monsters quickly traversed several fields (plowing through barbed-wire fences without a pause) and neared a troop of soldiery who fired several sporadic rifle volleys and then scuttled away like frightened rabbits. Bullets had no apparent effect on the monsters and they disappeared in the distance.

Major Whinny got two pieces of news at once: one that the ships and surroundings had been bombarded to dust and the other that two of the Robot Aliens had escaped and flown the cage.

* * *

"Just *what* are we faced with?" gasped the President of the United States, his tone betraying inward agitation.

Secretary of War Rukke ran a finger around his tight collar. "That is not easy to answer, Mr. President. Suggestions have been pouring in upon me but they are all guesses. Some say they are a foreign threat, first members of an invading army of metal monsters; again they are creatures from the ocean depths, encased in pressure suits; or they are people from the center of the earth; or they are the invention of a crank who wishes to see the downfall of civilization; or they are the brain-child of a mad scientist who made thinking machines which then destroyed him and ran amuck; or they are an evolutionary product of a remote and unknown island. But the suggestion that most appalled me was that they are creatures from another planet!"

The President smiled even in his predicament and bent a pair of amused eyes on the Secretary of War.

"Strange, isn't it, how people's imagination will run away with them?" he said half scornfully. "Ocean creatures . . . . depth creatures . . . . beings of another planet . . . . *bah!* The public has been absorbing too much of these—what is it called? — 'science-fiction' stories that have been circulating the last twenty years. I read some of them once out of curiosity. They are so preposterous and hare-brained that it is no wonder all those queer ideas about the metal monsters sprang up. All crazy, aren't they, Rukke?"

"Well, yes," answered the War Secretary half defensively. "But still, Mr. President, they are *something* out of the ordinary. We've all heard of robots and mechanical men a lot, but damn me if I've ever heard of things as independent and —and human-like as these latest ones. And the important thing is—what to do about them?"

"Yes," mused the President, stroking a dictatorial chin. "We must do something about it, that's sure. You say there are only two of them now?"

"Just two," assented Rukke. "Major Whinny and his Fort Sheridan militia bombed and destroyed the third and their ship. He went over the ground after the bombing and found it strewn with pieces of machinery, wheels, cogs, gears, axles, wire, plates, etc. Yet the ship's hull had withstood the bombing to a surprising degree, being shattered only into large sections, not into small pieces. The inner contents of the ship, which was quite a large one, were completely demolished, and by its large amount of débris, indi-

cated that the ship must have contained a great deal of apparatus of some sort, probably mostly motors."

"And Major Whinny tried unsuccessfully to communicate with them before the bombing?"

"Yes, Mr. President. Whatever or whoever they are, they understood no common earth language—or did not care to."

"And they have destroyed property and caused death and injury to several dozen United States citizens?" continued the President.

"Exactly, Mr. President. And they have made no attempt to explain their presence or get in touch with authority."

● The President pointed a pudgy finger.

"Then, Rukke, we must hound the two remaining metal monsters down and destroy them as being unwanted, unauthorized, and dangerous aliens in the boundaries of our great nation. Whatever their purpose, it cannot be benevolent, for it has already proven the opposite. Therefore will I issue a formal denouncement of the two metal monsters which will empower you to war upon them with any and all means at our command. The most logical explanation of their presence is foreign machination, and our glorious democracy *must* be saved!"

With these words to inspire him, the Secretary of War tripped little switches here and there and started the United States air corps into action. The Chicago fleet was ordered to send out scouts to locate the two fleeing metal monsters, and upon finding them, to bomb them. The Newark, Annapolis, and Atlanta fleets were told to prepare for anything. There was to be no question of expense or trouble—it was to be done at all costs.

* * *

The Mayor of Chicago darted his eyes all about the room before he next bent close to Alderman Gorsky, speaking in hushed tones.

"So, Gorsky, you see him about that. Tell him it's O.K. with me. Get a regular contract and purchase papers. Have X—you know who I mean—make out the fake contract and bring it to me secretly and I'll look it over. Then have G.S. come here next week Monday at noon and we'll figure out *his* cut. And then—and then, Gorsky—" The Mayor smiled unctuously.

Gorsky licked his fat lips as though thinking of fried chicken, which he loved with an unholy love—the same love he bore toward what is called "filthy lucre."

"And then," finished Gorsky, "we'll find fifty thousand lying in front of us, like a present. A park will go up on the South Side, the contractor will be paid, the people will be pleased in my ward, and no one will miss a bit of money that slips *our* way!"

"Yes, yes," said the Mayor, rubbing his hands gleefully. "Oh, yes, yes. But for Heaven's sake, watch your step. That snoop of a Socialist, Berger, is just waiting to pin me down. If he ever found out this one—"

He broke off, listening. "Say, Gorsky, what's that noise?—hear it? like a steady roar somewhere south?"

Together "Honest Pete," the Mayor, and his pet alderman cocked their ears and sought to define that rumbling and rushing sound that came to them above the loop traffic roars. Gorsky ran to an open window and looked out upon State Street. Beyond the fact that hundreds of people had stopped and looked around puzzled, there was nothing to see. The Mayor grabbed the telephone and called below. "What's up?" he barked.

Gorsky saw him grow pale, saw a trembling hand hang up the receiver.

"Good Lord, Pete! What's the matter?"

The Mayor, all his poise and smugness gone, answered in tones that had lost their oiliness and grated harsh instead, "Those metal monsters! They're coming down Michigan Avenue. All traffic is jammed—there have been dozens of smash-ups—people running madly—police are helpless—bullets don't touch them at all!"

The faint and distant sounds grew to a roar as the metal monsters came north on Michigan Avenue and neared the con-

gested Loop with its thousands of shoppers and innumerable cars. The Mayor wanted a close look at the creatures that had been headlined for five days, yet dared not leave his office and risk life and limb in the madhouse outside where hundreds ran screaming about in a frenzy. Yet the Mayor had his wish; for some inexplicable reason, the two tall metal beings turned off Michigan Avenue and finally came down State Street, passing just under his window.

In a suddenly deserted street, except for numerous stalled autos and one lady who had fainted and lay flat on the sidewalk, the two Robot Aliens made their way. As in a hideous dream, the Mayor and alderman watched from their window. A moment of panic came to them when a lack-luster, depthless, mechanical eye bored straight in their direction for a split second.

Yet for all of the reputation the creatures had as ravening, ruthless, destructive monsters, the Mayor saw that they moved along quite c a r e f u l l y, walked around autos, stepped very carefully over the reclining lady, and made no move to voluntarily destroy property. But accidents will happen; one of the Robot Aliens, in passing the Mayor's parked car —a new Duesenberg with shining body— got his left "foot" caught in the back bumper on the up-step. There was a rending of groaning metal, a sudden flurry of tentacles and arms, and then the metal monster toppled off-balance directly onto the Mayor's car. From an almost complete ruin, with the seats and top ripped to shreds and the fenders scratched by waving tentacles, the fallen Robot Alien arose. After a hasty glance at the sorry mess, it imperturbably joined its companion and went on, its own outer body not so much as scratched!

The Mayor looked at the wrecked car, which had been his joy and pride for but a week, and mentally made a reservation to increase his graft to twice what it had been agreed upon on the park project in Gorsky's ward.

The metal monsters passed out of sight with their crackling, flame-spitting antennae, which sounded so much like rifle fire from a distance.

* * *

Commander Jill of the Chicago Air Fleet looked around at his several underofficers with whom he was in conference, a peculiar smirk on his lean face.

"So with seven bombers and a squadron of scouts, we're to hunt down and blow up the metal monsters—two harmless and innocent somethings that have done nothing but walk around and scare people. But orders are orders and these came from Washington."

"Why call them harmless and innocent, Commander?" asked one officer. "They've already caused dozens of deaths and lots of damage."

"Sure, sure," agreed Commander Jill. "But only because people lose their heads and kill each other in the rush to get away. Now I've been following this up pretty close, and do you know there ain't a stitch of evidence that the metal monsters have any weapons? They have caused only indirect deaths without premeditation."

"But what in the world *are* those metal monsters?" asked a young fellow. "Everybody talks about what they do and how they look, but nobody says *who* or *what* they are!"

Commander Jill shrugged his shoulders. "Nobody knows, either. What I'm driving at is that the authorities should be reasonable and try to capture the blasted things and find out what they are. They may have a human brain running them.

"Well, to the devil with it. Our orders are to bomb 'em, and bomb 'em we will. Now yesterday they crossed Chicago going north along Michigan Avenue out through the Loop, went west on Lake Street, and circled south again. Then they picked up speed as if they'd seen all they wanted to see of Chicago, and scooted out toward Harvey. No reports on them last night so I figure they must have laid low some place in the dark. Now it's daylight again and I figure they'll be moving

soon, wherever they want to go next. So we'll head for Harvey and Homewood and thereabouts and scout around till we locate 'em. Then we send our bombers."

"It's going to be some job bombing things that small," said one officer. "Unless we swing low. But it'll tear up the country something fierce."

"Orders are orders," returned Jill.

A squadron of small ships arose from the army airport of West Chicago and flew southeast. At Harvey they dispersed and scoured the countryside, the relief pilots peering downward eagerly. It was a plane that had penetrated far to the east that finally discovered two shining figures moving along concrete highways in the direction of Gary, Indiana. A radio message brought the other scouts around and a half-hour later seven roaring bombers came to the scene.

Commander Jill in his flagship told the pilot to loop ahead of them so that he could see them close. Unblinking, expressionless eyes followed the course of his ship as it looped not a hundred yards ahead of them. The two Robot Aliens were jogging along at some twenty miles an hour, apparently as light-footed as athletes. A continuous play of electricity sparkled at the tops of their heads.

It was a dull day of clouded skies and the white metal of the monsters made a perfect target. Commander Jill ordered a bomber to swoop overhead and make a try. The bomber descended in a power dive, flattened at half a thousand feet, and dropped an egg. It was a small bomb as bombs go but uprooted a dozen trees at the side of the highway—it had missed the mark by a hundred feet.

The effect on the metal monsters was to cause them to stop and stare upward much as a human might if a house had dropped from the sky. While they were standing still, Commander Jill sent another bomber at them. It seemed like a sure thing; the egg arrowed straight at the metal beings. But at the last second they leaped away with amazing dexterity. The egg tore a jagged gash in the highway and flung fragments in a geyser, some of which struck the metal monsters with what would have been a death-blow to a human. It had no more effect on the Robot Aliens than a feather might.

Commander Jill had watched with fascination and noticed that the metal monsters displayed no sign of fear. They had become wary, watchful of the menace from the air and stood undecided, but yet their every action showed nothing of that emotion known as *fear*. They did not run about in panic or betray fright. They seemed to be calmly appraising the threat of air attack and making a careful, unhurried plan of escape. That this was so became apparent a moment later. As a third bomber dove at them, they separated and ran in opposite directions, at right angles to the highway, out into the open prairies. One would eventually reach a state forest preserve not three miles away to the north; the other would find only open fields and towns for a long way.

Commander Jill muttered a "damn!" at this strategy of separating forces on the part of the Robot Aliens and sent three of the bombers after the one going north and four after the one going south. He himself went with the ships going north. Again and again his bombers swooped and dropped their little eggs, plowing up soil that had never felt the concussion of bombs since the birth of time, and each time they missed, for the fleeing metal monster seemed to have supernatural eyes, and without slackening pace, it nimbly sidetracked the explosions. Commander Jill knew before an hour was up that it was a waste of bombs, but knowing also the criticism he would get should he return with any, he methodically sent his bombers down in one-two-three order.

The pursued creature bored deeper into the forest preserve and became practically invisible to those above. Commander Jill, ascertaining they had but two eggs left, had these blindly thrown down to the trees, and then gave the command to return to base. He was not surprised to hear soon after that the metal monster which had run south had also escaped destruction.

CHAPTER V

The Man With Logic

● Frank Miller, wealthy owner of a tobacco plantation and a graduate of Yale where he had majored in botany, listened to the radio News Service just after lunch. The announcer's voice was excited.

"*Flash*—second of Metal Monsters destroyed at 9:04 a.m. today! The strategy of General Pille of West Point succeeded. His battery of ten cannons, camouflaged and secretly placed, took the unsuspecting metal monster unawares and blew it to bits. General Pille, who will get a Congressional Medal for great service to the country, had kept the Metal Monster's movements under observation during the last three days since it left Chicago, after paralyzing that city's traffic and business, with its companion. He foresaw that this one coming east preferred using concrete highways to sneaking about fields; it disregarded traffic entirely and offered no molestation. Of course, it is well known that numerous deaths have occurred because of this, due to the fact that drivers, confronted by the horrible monster, either lost control of their cars from fright, or fainted dead away.

"General Pille knew that aerial bombing was out of the question, for the monsters have already demonstrated a peculiar quickness and cleverness in jumping and running. So to him came the brilliant idea of waylaying the creature along its known course and allowing it to walk into a few high-powered shells. All traffic was cut off the Pittsburgh highway for a hundred miles either way and the Metal Monster came along finally, all unsuspecting. Ten cannons, placed so as to sweep an area of a hundred square yards, boomed forth at once. One shell struck the creature squarely and scattered it to the four winds in tiny pieces. Thus that menace is gone.

"As to the one which headed south, it has been reported at numerous spots and its course has been plotted to take it into Kentucky, somewhere near Henderson. At present, the clever General Pille is planning to waylay this one in something of the same manner."

Frank Miller pulled the bell-rope. To the butler who answered his signal he asked, "How far is Henderson from Owensboro here, Jussy?"

"About thutty mile by road, suh," answered Jussy. "De way de crow fly is ony 'bout twenty mile."

"I see. Thank you, Jussy. By the way, Jussy, can you round up for me the news about these—these what they call Metal Monsters? Frankly, I haven't bothered myself much with headlines for the past month, but now I'd like to read up on it.

"Oh, yas, yas suh," eagerly supplied Jussy. "Ah been saving de newspaper accounts eber since dat fust day w'en dey come down. Just a minit, suh; ah'll bring de whole bunch to ya, suh."

Jussy left the room and returned in five minutes with a sizable armful of newspaper clippings, all with enormous eye-searing headlines.

Miller excused his butler and sorted the printed matter out. First he read just the headlines, with a faint contemptuous smile at their flamboyant sensationalism. They told much and yet little:

June 8th (a.m.)
—"METEOR OF LAST NIGHT IS SHIP"

June 8th (p.m.)
—"METAL MONSTERS IN QUEER SHIP"

June 9th
—"METAL MONSTERS KILL THIRTY"

June 10th
—"MILITIA BOMBS; DESTROYS ONE"

June 11th
—"MONSTERS INVADE CHICAGO"

June 12th
—"AERIAL ATTACK FAILS AGAINST MONSTERS"

June 13th
—"MONSTERS RUNNING AMUCK"

June 14th
—"ONE MONSTER NEARS PITTSBURGH; OTHER SOUTH"

And now it was June 15th and the headlines of the *Evening News* would tell of the destruction of the metal monster being near Pittsburgh. Then the headlines would follow the third and last "monster" till it, too, was destroyed.

Frank Miller had something of an analytical mind. He went through all the printed material, reading only here and there where the words caught his searching eye. When he was done, three things he had read stuck in his mind. The first was a sentence from an interview of Professor Honstein of Yerkes who had been one of the first to see the ship and metal beings: ". . . . and I verily believe they are from another planet, perhaps another solar system, creatures of a metallic evolution, as opposed to us of an organic evolution . . . . "

The second was from an interview of Commander Jill of the Chicago Air Corps: " . . . . my impression was that the creatures knew no such emotion as fear, which is strange, for even an iron man, threatened by destruction, should show fear of that doom, whether there is pain connected with it or not . . . . "

The third was from the biting pen of a well-known satirist and cynic, who had written an essay on human nature after observing the chaos in Chicago, when it had been visited by the monsters: " . . . . isn't it strange that as yet the so-called 'Metal Monsters' have displayed not one weapon, nor have ever actually performed the act of killing? What, then, accounts for over a hundred deaths in Chicago on that great and exciting day . . . . "

Miller mused awhile, then suddenly threw the clippings down on the desk and rang for the butler.

"Jussy, have Jamie saddle up Old Baldy. I'm going for a jaunt till dinner time. When I'm gone, you can take away your clippings."

It was Miller's habit to put from his mind all mundane thoughts while out riding, and to enjoy the quiet woodland scenes. He put Old Baldy to a trot at first till they were well away from Owensboro, then let him walk along at his ease. Tall oaks and majestic maples cast a soft shade over him. Song birds twittered and occasionally sang sweetly. The peace and joy of a quiet June day hung all about him like a subtle perfume.

● Frank Miller, of a long line of tobacco kings, was unmarried at the age of thirty. His wealth could have bought him social prestige in any large city, but like his ancestors before him, he preferred an unostentatious life in practical obscurity. Owensboro was the seat of the ancestral mansion, founded by his great-grandfather. The Miller tobacco plantation was farther south. Intelligent and well educated, the last of the Millers found his greatest enjoyment in reading, with hunting and fishing for diversions.

At first aimless in destination, Miller suddenly decided to visit his private hunting cabin secreted in a large hardwood forest to the west. Many a week he had spent there in autumn during the hunting season. The footpath in one place bisected the road between Henderson and Owensboro. He had to bend low at places where low-hung branches waved at face level. At the road crossing he straightened up, then reined in his horse sharply. A block down the road was a tall metal creation rapidly approaching him.

"Lord!" breathed Miller at his first sight of a Robot Alien in life.

His first reaction was a slight panic. Then he remembered the cynic's words, saying that the metal monsters had never displayed a weapon nor an inclination to wreak harm. In other words, it was only blind human fear that had made the metal beings so formidable. Miller squared his shoulders and waited for the queer thing to come up. He was determined to see it as close as possible; it would be an experience to be proud of for the rest of his life.

The Metal Monster was coming along at an easy jog and the watcher marveled that it moved so quietly, without the clanking noise of worldly machinery. Its eight arm appendages were folded against its body, but Miller could see its several eyes clicking and shuttering as it turned its "head" slightly from side to side, showing that it was not oblivious to its surroundings.

The human watcher found himself wondering what marvelous machinery ran

that giant metal frame, what powerful and efficient engines gave it motive power. He wondered too how much of intelligence reposed behind that immobile metallic shell and whether it was organic intelligence or mineral, as Professor Honstein maintained. His whirling thoughts even asked: "And for what purpose is it wandering over the face of Earth?" Miller felt that it would be a great thrill to know all the answers.

As the mechanical being lumbered up, grotesque and awesomely large, an eye fastened on the lone human. It seemed to drink in the picture of Miller sitting erect and undisturbed on his horse, returning stare for stare. *Then it stopped!*

Miller paled a bit at the sight of the inhuman thing standing still and facing him from not twenty feet away. Then he saw a jointed arm stretch jerkily toward him; long metal fingers clenched and unclenched. But Miller was more puzzled than alarmed, for the creature had not stepped closer.

His horse, well used to seeing all sorts of vehicles, stood motionless and Miller himself sat like a statue, wondering what would come of this impossible dream where a twelve-foot animated clockwork waved arms at him.

The creature next uncurled a tentacular arm and made four imaginary circles with it, pausing after each one, and then tapped its breast.

"God!" breathed the man. "It's—it's trying to *talk* to me!"

Miller was a man of quick decisions. "It" wanted to talk to him. "It" was seemingly friendly. And Miller found himself wanting to talk to "it"! It occurred to him at the same moment that if they stayed in the open long, someone else would spy the monster and would spread an alarm. Miller didn't want that. He wanted to have the creature to himself for at least a few hours, to find out whether communication between them were possible. His hunting cabin sprang immediately into his mind as the ideal spot for secrecy.

Miller made a simple pantomime. He pointed to himself, then to the creature, then down the path. The metal being repeated the gesture with an arm, as if in agreement.

Thereupon the man spurred his horse forward, crossed the road, and looked back. *With ponderous steps, the metal monster was following!*

Probably none of the succeeding events thrilled the young tobacco king as much as that realization that he had made a contact, however slight, with the metal monster which all the rest of the world feared and cursed.

The hunting cabin was five miles away. While Miller rode his horse at a trot and turned back each minute to see the incredible miracle following him like a dog, he began to wonder what he would do next. The creature had no mouth and therefore no voice. It had ears to hear, but no tongue to speak. Then another thought struck him: it had eyes to see and *fingers to write!* If it had a reasonable intelligence, he ought to be able to show it the connection between written words and their meanings. But that would take days—and days—and days—

Miller jumped from his horse when they came to his cabin, took a swift glance inside, and then returned to the metal monster which stood motionless near the door. He looked at it reflectively for a moment. Would it prove to be of low intellect, like a jungle beast?—or of an order of intelligence approaching the human?

Miller pulled a card from his pocket and wrote with his fountain pen a short message to Jussy. "I am staying at the cabin overnight. You come here this evening with some plain food. And whatever you hear or see, Jussy, come up to the cabin."

He pinned the card to the saddle horn, headed Old Baldy down the trail a ways and gave him a slap on his haunches. With a startled whinny, the horse galloped out of sight.

● Emotionless, lack-luster, mechanical eyes followed the man as he stepped again into the cabin, to come out this time with several sheets of yellowed wrapping

paper and a flat board. Miller printed the word *man* in large capitals with his fountain pen and showed it to the creature, pointing to himself. Then he wrote the word *tree* and pointed to a near-by oak. Then he wrote *eye* and pointed both to his own and the creature's eyes.

This done, he drew a long breath and held the paper toward the metal being, wondering if it would understand. He watched in fascination as a double-elbowed arm unbent, raising a hand with one outstretched finger. Unerringly, the finger pointed to man, tree, and eye and their corresponding words.

"Lord!" muttered the human. "It—it understands!"

He then made a list of ten more simple nouns: grass, leaf, bark, house, pen, cap, leg, arm, dirt, and ear. He went through the list once, and to his astonishment, the creature duplicated his designations without the least hesitation. It not only had human-like intelligence, but it seemed to have a phenomenal memory to remember words it had never seen before in relation to their counterparts.

Miller next tried less concrete ideas: jumping, running, waving, air, sky, light and shade, etc. Sometimes he had to repeat his pantomime once or twice, but, invariably, the metal being caught on and repeated them and pointed to the correct word. At the word *air*, Miller swung an arm about, drew in his breath sharply, expanding his chest and pointing to it, and again pointed all around. The metal being was puzzled and made no move. Again Miller went through the motions and added another, waving his sheet of paper so that a breath of air blew a tiny heap of sand from his palm. Then the Robot Alien showed understanding by poising a leaf on a tuft of grass and sweeping his broad foot past it so the air currents blew it off.

This miraculous display of keen intellect convinced Miller that he was dealing with a mind at least equal to his own. After trying a few dozen more words, Miller heard the sound of hoof-beats. Jussy came up on Old Baldy.

"I brought ya sump'n to eat, like ya said, suh," began Jussy, holding out a paper package. "But w'at does y'all mean by—"

His eyes at that moment encountered the Robot Alien who had been partly in shadow and practically invisible from the trail. Jussy's black skin grew three shades lighter and his eyes popped in terror.

With a shriek, he reined Old Baldy about and attempted to leave, but his master had a firm grip on the bridle.

"Lemme go!" wailed Jussy. "Ah jus' seen de Debil—jump on, massah an' let us go w'ile de goin' is good!"

"Listen to me, you fool!" said Miller, hardly knowing whether to laugh or be angry. "Jussy, look up!"

"Yassuh!" said the darky, uncovering his face and looking at his master.

"Jussy, I've always been good to you, haven't I? And my father was good to you, too, while he lived, wasn't he?"

"Yassah, dat's so!" said the darky, glancing fearfully back and wondering which of them had gone crazy.

"And you'll trust me that I wouldn't ever bring you to harm," continued Miller soothingly.

"I believes in ya, suh."

"Then come down off that horse and quit your trembling. That creature is not the devil and it won't hurt you any more than it did me in the past two hours."

Be it said here and now that Abriel Jussy, though little known to the world and far less honored than such men as Chief of Police Saunders of Joliet, Captain Pompersnap and Major Whinny of Fort Sheridan, and Colonel Snoosharp of the Secret Service, had yet more courage in his simple heart than any of them. Once his master had vouched for his safety, and once he had seen that the fearsome metal creation was as gentle as a kitten, he dropped his instinctive fears and looked at it in curiosity.

"Come along," said Miller who knew human nature and knew that Jussy would bear up like a man. "Let me show you my pet and what I taught him already."

In Miller's mind, the metal being had

changed from an "it" to a "him," on partaking of semi-human attributes. He held up the paper so that the mechanical eyes could see and pointed to *man*, whereupon a tentacular arm swung first to the master, then to the butler.

"See?" said Miller with pride in his voice. "He understands."

"Lawd help me," commented Jussy. "Der mus' be a man inside o' it."

"I don't think so, Jussy, not a *man!* But I do think there's a brain, or a creature with a brain, in it, all right. And believe me, Jussy, that brain is a mighty intelligent one."

"Yassah. But what y'all plans to do, suh, wit' dat t'ing, now ya got it heah?"

"Jussy," began Miller, "I'm going to *teach* that creature the English language by means of words in print. I don't care if it takes a month or a year. I'm going to live right here at the cabin and you and Jamie will bring me food. You circulate the news at home that I've gone to Europe or China or somewhere and won't be back for an indefinite period. You and Jamie are going to bring me books, too, lots of them with *pictures*—and paper—and pencils—and a special oversized, metal pencil for that metal man so that he can write and tell me what he knows, after he learns enough to write.

"Jussy, old boy, we're going to surprise the whole world!"

CHAPTER VI

Proxies from Mars

● An abridged version of Frank Miller's famous work "The Robot Aliens" follows.

"It is sad, indeed, that the authorities misconstrued the events immediately following the landing of the mystery ship in northern Illinois, and saw fit to declare a state of war on what were known as the 'Metal Monsters.' For the following paragraphs will demonstrate that the 'Metal Monsters' were not ferocious enemies of mankind but simply *proxy ambassadors from the civilization of the planet Mars,* simply ingenious robots that took the place of flesh-and-blood Martians in the long and trying trip through space.

"On June 15th of this year of grace, 1942, I met the sole surviving Robot Alien on a deserted road between Henderson and Owensboro, Kentucky. Whatever upheld my courage, I do not know, except that it was, perhaps, an intuition or hunch that the fearsome creature I saw approaching was fearsome in appearance *only,* but nevertheless, I held my ground and watched it. From that started our contact, for I thereupon led it to my private cabin in the woods and started the task of communicating with it. The Robot Alien confided in me recently that it had more than once tried to get into close contact with earthly beings but none had had the courage to stop and face him! Incredible fact!

"In two months I had taught the Robot Alien enough so that we could exchange information of a simpler sort. It seems strange that I should speak of the Robot Alien as of a living being, when actually it is a machine, but since I do not know the name of the Martian he represents, (we used the symbol X between us) and since the Robot Alien itself is more real to me than its controlling power millions of miles across space, it is easier to speak of the robot as the actual being.

"Briefly, X on Mars and his two companions (Y and Z) constructed, after a lifetime of work, the three robots which we saw here on earth. These three ingenious mechanisms were encased in a welded ellipsoid, along with numerous instruments, and shot to earth under rocket power. From what I have been able to learn, the task of sending living beings through interplanetary space has baffled and foiled Martian science for countless ages—there are a number of special conditions that cannot be overcome, such as cosmic rays and the terrific cold. So they did the next best thing and sent proxy robots. Even at that, it was a difficult task—the ship had to be automatic in operation and it had to be guided from an ever-increasing distance. But all other troubles had been avoided; there was no air to

worry about, the cosmic rays had no effect on metal, the time of travel meant nothing, for the robots required no food or water, and the landing, which would have been disastrous to protoplasm, hardly affected the sturdy robots at all.

"The ship took four months to cross the void. Every last bit of rocket fuel was used up in the landing, but yet it was not enough to prevent a terrific crash. Only the incredibly tough hull saved the contents from being ground up into metal hash. As it was, one of the robots and several of the instruments were damaged in the meteoric landing.

"Now a word is necessary on the robots themselves. What they are run by, or what ingenious mechanical principles they operate upon, I do not know—our present interchange of words includes nothing of such involved things; but I am confident that years of effort on the part of scientists and engineers will finally bring all that out.

"But for my part of the affair, I only know that the contact between X and Y and Z and their respective robots was unbelievably intimate. The Robot Alien (or rather X, *by means* of the Robot Alien existing on earth today) assures me that he hears and sees and moves as surely and accurately as though he were a human being walking around on earth! To X, the Martian, he is almost as fully living on earth as though he were here instead of encased in some sort of complicated control chamber on Mars!

"Thus it will be understood that when the Robot Aliens stepped from their ship and first cast eyes on Earth, it was with the same thrill that an Earth-man would get stepping from a ship and gazing at Martian topography! To all intents and purposes, X, Y, and Z might just as well have been on Earth, except that the sense of feeling, smell, and taste were absent.

"It was Z's robot that was injured in the crash, its legs being mangled beyond use. Accordingly, the other two carried Z's robot out of the ship so that it could help with the instruments. These instruments are, for the most part, incomprehensible to me and X did not try to explain them. However, I know that, with them, they tested such things as gravity-pull, air-density, air-composition, and the sunlight intensity, all for their Martian scientific records.

"The Robot Alien managed to convey to me that they were astonished beyond all measure at the fear the earth-people showed from the first. It may interest humanity that X (and therefore all Martians) considers that human reaction a trait of low intelligence, and poor reasoning powers that are completely dominated by an instinctive emotion that surprises them. My own interference from this is that Martian civilization, vastly older and more advanced than ours, has uprooted and cast out that atavistic emotion known as 'fear.'

"At the precipitate panic and flight of over a hundred persons on the first morning (when all X wanted was to get into communication with them) the Martians were puzzled. However, they bent to their work and completed most of it by the next day. Then when an armed party of humans approached, they were overjoyed that at last they would establish contact with Earth-people. Imagine X's astonishment, when, after advancing a step to meet them, they fled in fright and shot their rifles at him! X was mystified and ran after them (which action we know caused the absolute rout of five hundred troopers and ten thousand civilians). At the top of the knoll, he saw with his mechanical proxy eyes the fleeing masses. I can picture in my mind how X and Y and Z, turned away from their controls for a moment back on Mars and talked over in bewilderment that strange action on the part of the humans!

"When the bombardment started, X and Y tried to drag Z inside the ship, but the imminence of destruction to the three of them caused them to save two of the robots at the expense of one. It was quite by accident that they entered Chicago, but curiosity led them onward as far as the Loop, where frantic motorists killed one another in their childish frenzy to save

each his own paltry neck from an imagined fear. They then abruptly left Chicago, which X tells me is a pitifully tiny city compared to those of Mars, and decided to see as much of earth as possible.

"The determined air attack decided them to separate for a better chance to survive the fury of the queer earth beings whose intellect was so low that they could think only of battle when they saw something beyond their ken. Y got his robot as far as the Pennsylvania borderline before a certain clever general ambushed it and blew it to a million worthless pieces, little realizing that he had in one mad moment destroyed a lifetime of work by a being ten times more intelligent and worthy than himself.

● "It is not for me to judge, nor to condemn, as to the manner in which the authorities acted when the Robot Aliens confronted human eyes, but I think that the mere reading of these facts will bring a flush of shame to many a man who had something to do with the welcome accorded our ambassadors from Mars. Perhaps the alibi should be that their coming was so unexpected and startling—a flaming meteor which excited the superstition of every person thereabouts—or that the newspapers with their desire to 'scoop' one another piled lie upon lie till no one knew the truth. Or perhaps world conditions were such that any such advent was looked upon as a threat of war from a foreign power. Nevertheless X says that he is glad he finally came into communication with earthly people and that he hopes much interchange of information will take place.

"All technical questions will have to be left in the air at present till we are able to teach X the finer intricacies of our language. After all, as yet, he knows less of the language than any ten-year-old on Earth—which is the best I have been able to do in two months. I know there are many puzzling questions that scientists will think of, not the least of which is how the Martian is able to so closely control his robot when there is a vast gulf of millions of miles between them. Light takes an appreciable time to cross that distance. How then could the robots dodge the bombs in that aerial attack, when the very impulse from Mars, if it traveled at the speed of light (which is the fastest thing we know of) would take minutes to get here? X intimates, although it is not clear to me, that his controlling impulses, and the return impulses (of eyesight and hearing), travel instantaneously by means of some bizarre higher physics of which earthly science knows nothing.

"At the first request from the authorities, I will turn over the Robot Alien into the hands of scientists who will be able to do far more than I have in the matter of interchanging thought. But they must have patience, for communicating solely by writing is laborious, especially when *one* subject must be taught the meaning of each new word, sometimes by lengthy processes.

"With greetings from X on Mars, I end this brief work."

* * *

Bert Boddel pointed dramatically skyward as he looked around the group of young boys and girls collected about his 'scope.

"Here comes Mars! Now let me adjust the clock and point the 'scope and then we'll all take a look."

This done, one after the other they peeped through at a small lumpy orange in the sky; some had to be dragged away from the eyepiece.

One girl's voice came awed from the darkness: "Who'd think it possible for those funny things to come from *away-y-y* up there!"

* * *

". . . . So I just stood there kinda fierce-like," said Lieutenant Arpy for the 864th time, "an' looked back at it. Damn' thing was chilly to look at, but it didn't *really* scare me. You don't believe the papers, do ya Murphy, when they says everybody ran? I'm telling ya, so help me Hannah, I stood there *all* the while . . . ."

(Continued on page 1129)

THE FATAL GLANCE

By DERWIN LESSER

● I will not even attempt to estimate the number, which must surely have run into the thousands, of science-fiction stories written between the years 1926 and 1954 in which the authors gave their opinions of the conditions which must exist upon the planet Mars, fourth from the sun. Fully twelve different science-fiction magazines, near the end of this period, ran stories rather regularly concerning strange life on the Red Planet—the arid crimson soil, and rare, suffocating atmosphere. Some writers pictured the creatures on Mars to be barrel-chested with long, thin arms and huge ears, while others stoutly contended that the planet was altogether unfit for life of any kind, except, perhaps, the hardiest of vegetation, for there was no doubt that the planet had seasons—white in the winter, and green here and there in the summer. Even the puny one-hundred-inch telescopes could observe that much.

The world in general took it for granted that no one would ever really know what *did* exist upon Mars, of course, and even the devotees of science-fiction had little faith in the probability that its secrets would ever be revealed to humankind. Why, if it was our business to know, said the man-in-the-street, we would probably have no difficulty at all in flying to other worlds in ordinary, everyday airplanes. The mere fact that it was *impossible* to leave the gravitational field of the earth was enough to prove that a Higher Power had created man for one celestial sphere and one only. Gravity was only a means of keeping him in his place. So said the man-in-the-street. How near to the truth he was or how far from it, was some day to be learned. Why, some people even said that Mars was Heaven, and that your eternal soul went there when you died!

Since the first day that man knew Mars to be a world of solid ground, he had wondered—he had pondered upon an unanswerable question of everlasting mystery. Mystery!—that is the word. Odd freaks in circuses were often called "Men from Mars." And the science-fiction author continued propounding his fantastic theories on the subject, and the science-fiction fan was broad-minded enough to consider them.

* * *

Thus the day came to pass in 1945 when it was announced that money would be collected from interested parties to sponsor the construction of a tremendous 420-inch reflector to be located in the desert wasteland below the cloudless Arizona sky, not fifty miles from the Flagstaff Observatory where Mars had first revealed the secret of her tracery that men called "canals." With the latest developments in magnification, a glance through the mighty mechanism, when completed, would bring the observer to the very surface of the moon, *and reveal the secrets of Mars at an apparent distance of twenty feet from the ground!* Then would one of the greatest astronomical mysteries be solved!

But the building of a 420-inch telescope is not just in a day's work—it would take at least nine years to construct, it was estimated—nine years of anxiety, nine years' strain on the imagination of all those who had any!

* * *

It was in the year 1954, midsummer, when headlines all over the country were announcing the christening of the "Seer of the Void" (for so it was named), and it was the first telescope so honored. It was also announced that five leading astronomers of the United States were to be the first to glance through the magic eyepiece. They were to look upon the surface of Mars—to gaze upon it as

though they were suspended twenty feet from the ground—to see something that astronomers for centuries past would have given ten years of their lives to glance upon for a second! But this is the age of progress and wonders never cease.

There is no need to record the conversation which passed between those five chosen ones that night in August under a crystal-clear Arizona sky. It might belittle them to put it in print. They acted not unlike a crowd of schoolboys, at their first circus, just before the show begins. Simply, it was the greatest moment in their lives—the greatest moment in the history of astronomy!

Dr. Janus, whom the world recognized as the greatest living astronomer of the decade, and who was to take charge of the "Seer of the Void" in the years to come, was adjusting the mighty mechanism and focussing it upon the planet Mars.

And then it happened!

Slowly the anxious hands of Dr. Janus became motionless as the focus was adjusted, and the look of anticipation vanished from his face as though it had never existed, replaced by an instant of utter surprise and bewilderment, followed by a nameless dread—then Wilson, the second in line, who was observing all this, fainted on the spot as he saw those eyes, Janus' eyes, which had just *seen!* They were eyes that had suddenly become lifeless as realization had seared its way through to the intelligence behind them.

Martin, the third in line, jumped to the eyepiece without forethought as Janus' body slumped to the floor. He stood there for a moment, peering eyes glued to that little circle of death, eager to *know.* Then he fell away screaming and mouthing in a manner that is entirely foreign to one in his right mind.

Warren and Bigelow remained. The latter fought his way to the eyepiece, forced on by an urge stronger than human will—a desire that weakened him during those moments of madness. But before he could place his eye to the instrument, Warren, the only one to keep his presence of mind, dragged him away, though he fought like a starving man being withheld from a steaming dinner. Had Bigelow the strength of his younger colleague, he would have broken through all resistance, for he was animated with a superhuman power, an urge that was not one of normal calling. The desire to *know,* a weakness of human nature, had almost brought him to a nameless doom.

It was many days before the three had recovered from that evening of unforgettable terror, especially Wilson, who had looked into the eyes of Janus and at his transfixed face as the life left his body. But after many trying sessions of debate, the word of such eminent men as Wilson, Warren, and Bigelow was taken to be good. Indeed, not one of those who questioned the authenticity of the story had the courage to *see* for himself! It was a very brave man who crept up to the mighty telescope as though it were a lurking beast and unfocussed the lens before it could destroy him.

Curiosity had killed *more* than a cat.

And so it was decreed that the telescope should be dismantled.

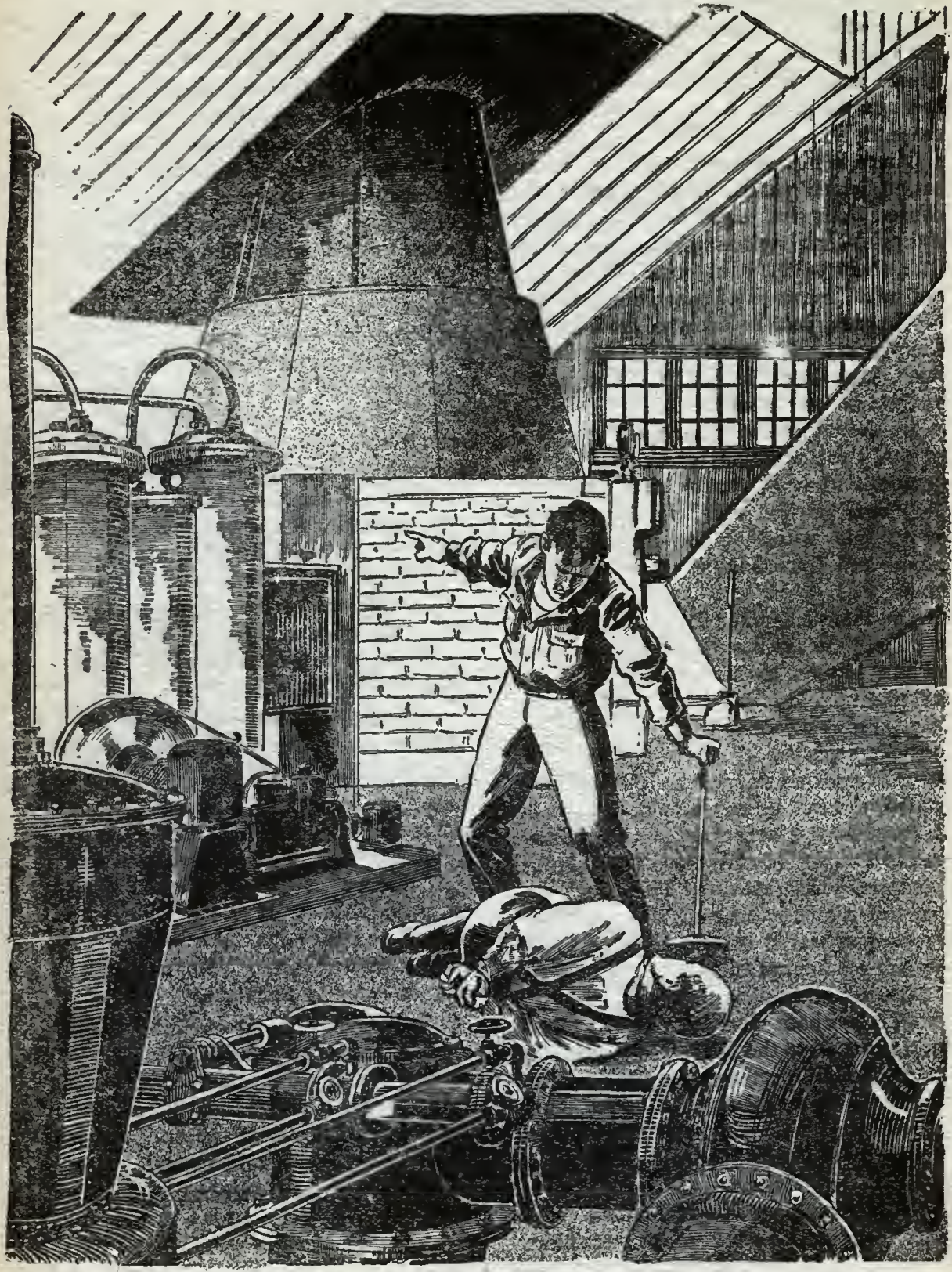
As for Janus and Martin—what *had* they seen?

Since August, 1954, there has been a total absence of science-fiction stories concerning Mars. It is very likely that the authors realize that their wildest imaginings cannot compare with anything so *alien,* so *outré* as the truth.

It has been said that anything imaginable by the human mind is possible. We can imagine only things and combinations of things that we have known, and therefore the most fantastic conception is not in the least bit *alien* in its essence.

But a thing that is entirely outside of our realm of experience and existence may not find a clear passage into our minds. *It may have to fight its way through to our realization, destroying as it penetrates!*

THE END



(Illustration by Paul)

"And now I shall start wrecking this devil's device of yours."

THE TRUTH GAS

By EDMOND HAMILTON

● **"Honesty is the best policy."**

That is a sentence which everyone is familiar with. Little children are taught it by their parents and it is strongly advocated in every school and college. Among other things, it means that we should never tell a falsehood.

Then there are such words as "tact" and "discretion." They signify what is fit, proper, and prudently wise. The question is, can you always tell the truth and be tactful and discreet at the same time?

This little tale draws a parallel to the author's "The Man With X-Ray Eyes," which we printed over a year ago, and will prove just as intriguing and original, though the development of the present story will amuse you.

Edmond Hamilton is one of the old stand-bys of science-fiction and is well up to standard here.

● Doctor Jason Rand's thin, frigid, intellectual face lengthened with severe disapproval and he drew up his spare, elderly figure ominously as his young assistant hurried into the laboratory.

John Daly saw his employer's attitude and his clean-cut, youthful face and quick brown eyes grew sorrowful. Silently he hung up his hat and donned his apron, and then came over to the apparatus-littered table where the elderly chemist stood waiting.

"You are twenty minutes late," Doctor Rand said icily. "What delayed you?"

Daly met his employer's frigid gaze a little confusedly and hesitated a moment before answering.

"Why, I'm sorry, sir, but the subway broke down on my way here," he said.

"You came straight here on the subway?" Rand asked, and Daly nodded.

"Then how is it that my taxi passed you a half-hour ago, sitting in an automobile with a young lady?" the doctor inquired.

His assistant flushed. "Well, I *did* meet my fiancé and talked with her a little, and—"

"And to cut it short, you were lying to me about the subway breakdown," said Doctor Rand unsparingly.

He contemplated the unhappy Daly with an unforgiving gaze. "You are exactly like ninety-nine people out of every hundred in this world. To avoid some little embarrassment, you will think nothing of telling a lie that inevitably causes much greater trouble."

His thin fist smote the table with bitter emphasis. "By heaven, what a world this would be if people could only be made to see that lying is the worst of crimes! If they could only be made to realize that lying creates nine-tenths of this world's troubles.

"There isn't a sin or crime in the world that doesn't depend somewhere on deception. If people always told the truth, all that crime and evil would become impossible and would vanish. Yes, this world would become a happy and sinless Utopia —if everyone in it could simply be made to tell the truth."

John Daly grinned despite the doctor's seriousness. "There isn't much likelihood of their ever doing it—not unless you rounded up everybody and gave them a dose of truth-serum."

Doctor Rand suddenly stared fixedly at Daly. "Truth-serum?" he repeated.

His assistant nodded. "Sure, you must have read about it, the stuff some doctors evolved and used on criminals to try to make them tell the truth whether they wanted to or not.

"They believed a drug could be produced which would cause a short-circuit

between the brain's thought-centers and its motor-centers of speech—so that what the brain really thought, or knew, it would be forced to speak, without possibility of the will interfering."

The elderly chemist nodded slowly, his brow suddenly wrinkled in deep thought.

"Yes, I remember seeing mention of those experimental attempts, now that you speak of it. I never paid them much attention."

He stared into space; his chill blue eyes narrowed a little, looking unseeingly beyond the waiting Daly.

John moved impatiently, and his employer came to himself with a sudden start.

"But enough of this subject. Just see that you are not late again," he told his assistant.

He took off his apron and donned his coat and hat, then turned toward the door.

"You go ahead with the isoprene compounds," he told Daly. "I'm going over to the Museum of Science Library to look up some things."

When Doctor Rand returned late that afternoon, John wondered what had happened to him. The chemist's eyes were luminous with inward excitement and his whole bearing was more impatient and excited than his assistant had ever seen it before.

He sat for two hours at his desk checking over certain penciled notes that he had brought back. John, stealing a glance at him now and then, saw that the elderly scientist was utterly engrossed.

Not until Daly locked up the cabinets and took off his apron to leave did Doctor Rand notice him.

He put down his notes and stood up. Daly saw with astonishment that there was an almost friendly gleam in his chill eyes.

"John, I shall want you to take charge of the laboratory for some time," he said without warning. "I am leaving New York tonight and I may be away several months."

"Leaving New York?" repeated John surprisedly.

"Yes, to carry out a new experimental project I have in mind," Doctor Rand replied.

"It's possible you won't hear from me until I return," he continued. "You will simply continue our work with the synthetic rubber formulæ, which is all charted out for months ahead."

"Very well, Doctor," Daly said, then added, "I wish you success in your new project."

Doctor Rand's ordinarily severe eyes and face gleamed bright with excitement. "If I am successful, you will know it before long," he said. "The world will know it."

John Daly did not regret his employer's absence during the next few weeks. It gave him a chance to quit work earlier than usual and thus have longer evenings to spend with Lois Lane. Neither was he worried by the fact that he had no word from Doctor Rand.

But as the weeks slipped into months and still Rand did not return, John began to wonder. He had never known the chemist to go away like this before and the whole thing seemed a little strange. When four months had passed and he had still had no word from his employer, Daly grew a little worried.

"It's not like him," he told his fiancé as they sat that evening in the comfortable living-room of Lois' home, a solid bungalow in a neat Long Island suburb. "I can't understand what he can be doing."

"You'll probably hear from him soon. I wouldn't worry," Lois told him.

She got up and whirled lightly before him in the soft lamplight, her bronze, bobbed hair tossing and blue eyes laughing.

"You haven't noticed my new dress," she told him. "Do you like it?"

Daly looked at the frilly apple-green dress. "No, I think it's terrible," he said.

The next moment he was thunderstruck by his own words. What on earth had made him say that?

He did think the dress was terrible, of

course. But Lois' clothes nearly always looked a little wrong to him, yet always before, he'd fondly told her they looked wonderful.

Lois' blue eyes were filled with amazement and hurt. "John, you're trying to tease me. And it's not funny."

"I'm not teasing—I really think it looks terrible," a stupefied John Daly heard himself saying.

"The color's wrong for your hair and the whole thing's too darned fluffy."

Lois' eyes filled with tears and her soft mouth quivered.

"If you think it's that bad, you need not see it any more. Good night!" she exclaimed, and ran from the room, her handkerchief stifling a sob.

John ran after her, calling her name, but she had fled up the stairs and did not answer.

● He stood in the hall, cursing himself. What on earth had made him say those things to Lois, even though they were true?

He hadn't *wanted* to say them. His brain had been framing a neat complimentary falsehood but his lips had spoken without his willing it, and had spoken the truth.

It would take days, maybe weeks, to make his peace with the girl. Gloomily, Daly took his hat and moved toward the door.

He stopped as his name was called and Wilson Lane, Lois' chubby, fussy, and pompous little father came after him.

"Why, John, you're leaving? Did you and Lois quarrel?"

Daly told him gloomily what had happened and Wilson Lane laughed loudly.

"Mustn't ever tell a woman her clothes look bad, even if it's true, John," he said, "not even after you're married to her."

He slapped the young man on the back. "Well, it won't be long before you and Lois are married. Think you'll like having Wilson Lane for a father-in-law?"

"No, I won't like it at all," John said.

He experienced instantly that same bewildered stupefaction. What in the world had made him say that?

Wilson Lane's brows drew together in a frown. "Oh, you won't, won't you?" he said acidly. "And why not, may I ask?"

"Because you're such an old fussbudget that you get on my nerves," John answered, without conscious will.

Wilson Lane emitted an outraged roar. "Get out of my house, you young whippersnapper! And if I ever hear of you coming here again, I'll meet you with a shotgun!

"I'm an old fussbudget, am I? No wonder that Lois couldn't get along with you. Get out!"

He pushed the bewildered Daly toward the door and a moment later the young man found himself standing out in the darkness with the slam of the door still reverberating in his ears.

He walked toward the subway station in a mental daze. Whatever had made him speak to Wilson Lane like that, after the weeks he had spent getting into the good graces of Lois' father?

Was he going crazy? The things he had said were the truth, but he hadn't wanted to say them at all. Was his mind cracking and no longer able to control his speech? He felt panicky as he rode back to New York.

When he got off the subway and shouldered gloomily through the Broadway after-theater crowds toward his apartment, he found himself stopped by a battered panhandler.

"Can you spare a dime, mister? I want to get a shot of liquor."

The next instant the man's battered face expressed blank astonishment. "I didn't want to say that!" he exclaimed.

John gave him a coin and walked on. A few doorways ahead a vendor of cheap razor-blades was holding up his wares.

"Will these blades wear good?" asked a cautious customer reaching into his pocket for the purchase price.

The vendor's face expressed sterling honesty as he replied, "Brother, these

blades are hardly good for even one shave."

Then he too seemed overwhelmed by what he had said and stared in uncomprehending amazement from one face to another.

John Daly began to take notice. It seemed that other people too were affected by this strange mental wondering that made it impossible to withhold the truth when speaking.

A man and woman were walking in front of him through the crowd and the woman, overdressed and overweight, was speaking accusingly in a harsh voice to the gray, patient little man.

"You don't want to go anywhere with me, that's the trouble. Are you tired of being married to me?" she demanded rhetorically.

"Yes, I've been tired of it a long time," said the gray little man, and then stood with jaw hanging in amazement at his own words.

The woman recovered from her incredulous astonishment to utter a loud cry. "You admit it, then? You're tired of me!"

"Darling, listen . . . ." vainly begged the dazed little man, apparently aghast at what he had said.

"You can't deny you said it!" she exclaimed. "You'd like to leave me, wouldn't you?"

"You bet I would," he answered, and then as he stood, stunned, she fell upon him with a shriek of rage.

Quickly a crowd gathered around the two, through which Daly glimpsed the wife buffeting the little man with shrill cries while he still sought vainly to excuse himself.

A burly policeman pushed quickly through the crowd, grasped the woman and held her back from her dishevelled mate.

"What are you beating this man up for?" he demanded.

"Officer, he's my husband and I despise him!" shrilled the woman wrathfully.

"Then why'd you marry him?" demanded the policeman, keeping his grip on her arm.

"Because I was tired of working and wanted someone to keep me," she answered instantly, then opened her mouth wide with utter amazement at what she had said.

A roar of laughter went up from the crowd, and the officer shook his stick threateningly.

"Get going, you, before I run some of you in."

Daly heard a sour voice in the crowd call out, "Why don't you hunt for gangsters instead of threatening honest people?"

"Because it's too risky," the officer said, and then exhibited the same stupefied surprise as the husband and wife.

He collected himself, though, and his face went purple. "Who asked that?" he yelled, but the crowd had already melted away. Daly was a half-block away before he stopped hearing the officer.

Daly climbed the stairs to his apartment with deepening surprise. What on earth was the matter with everybody?

It was as though everyone had been seized with the same mental trouble as himself, and could no longer control their speech but blurted out the truth every time they spoke.

Was it possible that there was some contagious mind-disease at large, something that attacked the brain and made it impossible to control the speech?

The telephone rang as John entered his apartment and his heart leaped when he answered it and heard Lois Lane's voice.

"John, I'm sorry you quarreled with father—he's furious at you," she said. "And I'm sorry I got angry at your teasing. You were teasing, weren't you?"

"No, I meant it," Daly answered, feeling a sinking sensation as he said the words against his will.

"What?" came the girl's outraged exclamation. "You were serious?

"Then I don't ever want to see you again. I called up to make up with you but this is too much. Good-bye!"

John jammed the hook up and down frantically but only the operator's voice answered. He hung up with sinking heart.

What *was* the matter with him? Was he really going mad? If so, those people in the streets must be all going mad also.

He had a desperate impulse to go back to Lois' home and try to explain everything, but decided it wouldn't do. He'd have to wait until her justifiable anger had cooled a little.

● Miserably he slumped into a chair. He heard from the next apartment the loud blare of a radio on which an oily voice was introducing a political speaker.

"And now," said the greasy voice, "Albert Moss himself will address you and will tell you just what he intends to do if you elect him governor. Ladies and gentlemen, Mr. Moss!"

John heard the vibrant, deep voice of Albert Moss, that renowned political leader, succeed that of his introducer.

"Ladies and gentlemen, I am asking you to elect me governor and I am telling you: This is what I shall do if you favor me with this high office. These are the things I shall strive for if I am raised to this eminence.

"My first aim will be to increase my personal fortune as much as possible, by every means within the letter of the law. I shall expect corporations whom I favor in recommending legislation to be suitably grateful, and shall also endeavor to enrich myself as much as possible by the sale of the more valuable state offices.

"Secondly, I shall try to get all my friends into well-paying official positions. Of course it will also be my care to build up my party's organization in apportioning appointments, and to discharge all members of the opposite party holding—"

At this moment the astounded Daly heard the voice break off suddenly. A moment later came the announcer's hurried voice.

"People of the radio audience, Mr. Moss' talk has been interrupted. His friends dragged him away from the microphone—"

Then that voice too stopped and a moment later another one hastily added, "This station is signing off."

Daly passed his hand over his forehead in amazement.

"So Moss too has gone nuts! Lord, there'll be plenty of excitement about that in the papers tomorrow morning."

But John found that the newspapers next morning gave only moderate space to Albert Moss' astounding radio speech. There were other and even more amazing events for the press to chronicle and they made almost unbelievable reading.

The noted ones of the nation seemed suddenly to have started vying with each other in making astonishing statements. A hundred cases had occurred where well-known men and women had calmly blurted out the most astounding facts, then had seemed thunderstruck by their words.

The mayor of Central City, that great midwestern metropolis, had been asked by reporters the routine question about corruption in the city and had electrified them by his answer.

"Yes, there is plenty of graft in this city and I am glad to say that I am getting my share of it."

"Mayor Dwerris, do you mean to say that you admit taking bribes?" the stunned newspapermen asked.

The mayor opened his mouth wildly as though to deny it but what he said was, "Sure I've taken bribes—lots of them."

The crazily excited reporters who ran to the States' Attorney asked that official breathlessly, "Mr. Dong, did you know that Mayor Dwerris has been grafting?"

"Of course I've known—he's given me plenty to overlook it," answered the official, and then was even more stupefied by what he had said than his listeners.

In Hollywood a movie star who was being interviewed on the radio had been asked, "Miss De Lane, just what is your feeling toward the public that has raised you to stardom by its admiration?"

She had answered, "I think they're a lot of saps to go see the junk I make, but it's their funeral, not mine." When she realized what she had said, she fainted.

In a San Francisco courtroom a great criminal attorney who had worked his defense of an accused murderer up to a super-dramatic climax had topped it by asking in a tense, strained voice, "James Bradley, on your oath to God, did you or did you not kill that man?"

The accused man had assumed his most solemn look of innocence and had answered, "Sure I killed him—I told you that when you took my case." The court had been thrown into wild confusion.

John Daly read of these and scores of similar cases with increasing amazement. This thing, then, was not affecting just a few people, but everybody. Everyone had suddenly begun to blurt out their real thoughts whenever they spoke.

The newspapers had no explanation for all these astonishing statements, as yet. They were too engrossed with the statements themselves. But John was becoming more and more convinced that some strange wave of mental trouble was sweeping the country.

It seemed to John that everyone went around that morning in a daze. They were stupefied to find that when they opened their mouths what they said was not what they meant to say. Everybody seemed suddenly unable to restrain their real thoughts from utterance.

At noon Daly heard newsboys crying extras and went out and bought one. The headline shrieked, "Stock Market Crashes!"

John read the story below. A terrific dip in stock values had been started by a news-dispatch from Washington.

The Washington correspondents had been interviewing the President that morning and one of them had put the time-honored question, "What do you think of the country's business prospects, sir?"

The President had smiled optimistically and had answered, "I think things are going to be pretty bad for a while yet."

That unprecedented answer was enough to cause a wave of selling in the exchanges that developed swiftly into a crash.

Daly saw the effects in the next few days. The stock crash was followed by an increasing panic. Prominent men had only doubtful things to say about the future, and each statement sent public confidence lower.

● Factories began to close down and the unemployed mounted swiftly in number. Business fell off still further because the clerks in stores described their goods to customers in truthful but unsalesmanlike fashion. Beauty shops closed down almost completely as their patrons learned people's real opinion of their accomplishments.

John saw fist fights in the streets everywhere—this sudden general madness of blurting out truthful but unflattering statements caused a great increase in crimes of violence. Similarly divorce petitions increased vastly as husbands and wives expressed their real opinions of each other. The country's life was in confusion.

And the thing had taken hold of the rest of the world, seeming to creep gradually around it. In Europe and Asia and Australia, men suddenly found themselves unable to speak anything but the truth. The results were in some places even more terrible than in America.

The English government fell when the premier admitted that he didn't believe in his own policies. The German dictator was slain by a mob when he made a speech disclosing himself as a self-seeking demagogue indifferent to his country's real progress.

France and Italy were at swords' points because of a candid admission by the Italian leader that he coveted the Savoy. Russia was torn by terrific internal strife, touched off when the wave of truth-madness made half the country admit it hated Communism.

In Tokio the War Minister had told foreign correspondents that when Japan finished annexing China, she would start on the Philippines. Washington had in-

stantly dispatched a warning note and war between the two countries threatened as their fleets mobilized.

Had the whole world gone crazy? It seemed so. All the institutions and safeguards of civilization were dissolving under this crazy wave of involuntary truth-telling. People did not know why they could not control their speech but they knew it was bringing disaster upon them. John Daly saw the shadow of war and chaos darken swiftly on the world.

Yet even this could not oppress John as much as his loss of Lois, of the girl he loved.

He called her again from the laboratory, but it was Wilson Lane who answered and his voice became rasping when he heard John's name.

"So it's you! I thought I told you never to bother us again."

"Mr. Lane, I just called to tell you how sorry I am that all this happened," John said desperately.

"Oh, so you've changed your mind about me being an old fool?" demanded Wilson Lane.

"No, I still think you are one," Daly heard himself say despite his effort of will to say something apologetic.

Wilson Lane exploded into five minutes of solid profanity and then hung up. Miserably John replaced the receiver and stared at the wall.

What was he to do? What was anyone to do, in this terrible curse of truth that had descended upon the world?

He was still staring at the telephone when it rang suddenly. With quick hope that it might be Lois, he answered.

To his surprise, Doctor Jason Rand's voice came over the instrument. Daly had almost forgotten his employer in his own troubles and the crazy condition of the world at large.

"I'm calling long distance from near where I'm now staying, to ask you about the laboratory," Doctor Rand said. "Have you been going ahead with the work just as when I was there, getting to the laboratory on time every day?"

Daly could not control his answer, he knew. Hopelessly he heard himself say, "No, I'm an hour or more late every morning now and I generally leave an hour or two early."

He expected an icy blast of condemnation, but to his astonishment, he heard Doctor Rand chuckle at his answer.

"All right, Daly, that's all I want to know. Just go ahead as you are and I'll see you when I get back."

Daly hung up and this time there was wonderment on his face as he looked at the instrument. Why in the world had Doctor Rand been so unexpectedly pleased at his answer?

He hadn't wanted to tell Rand the truth, of course. He had wanted to assure him he was on time every day, but like everyone else now, he had had to tell the truth despite himself.

Was that why Rand had called him? To see if he *would* tell the truth? It had certainly seemed so, as though Rand had only been using him for a test of some kind.

Suddenly Daly sprang to his feet, quivering with excitement. He had suddenly remembered the conversation he had had with Doctor Rand about truthfulness the day before the chemist had departed.

What had Rand said? "This world would be a happy and sinless Utopia if everyone could be made to tell the truth."

If everyone could be made to tell the truth! But that was just what happened; something had made it impossible for everyone to speak anything but truth. Had that something been devised by Jason Rand?

It was insane to think that, John told himself. How could any one man make it impossible for anyone on earth to lie? Yet he could not rid himself of the conviction that somehow Rand had done it. He tried excitedly to remember more of their conversation.

He remembered now that he had said that only by administering truth serum of some kind to everyone could they be made to tell the truth. Had Rand done that somehow? He must have used something upon the peoples of earth to affect them

so, and he must have used it in a way that reached every living person on earth.

But there wasn't any way a serum or drug could be administered almost simultaneously to everyone on earth, was there? Then John smote the table with his fist as his brain saw light. Of course there was a way!

● The atmosphere! If the serum or drug were produced in gaseous form, and this gas poured into the atmosphere on a large scale, it would ultimately affect everyone who breathed. Rand must have done that.

It would not be hard to find out, John told himself. Rapidly he set up apparatus and before long was making a delicate test of a sample of the atmosphere. He found it had in it extremely small amounts of some unknown compound.

It was that compound, that gas breathed in with every lungful of air, that was somehow making everyone speak only truth. Daly was convinced. To make certain, he carefully prepared two little chemically absorbent pellets and put them into his nostrils.

Breathing through them, he found the air seemed no different. Yet they should absorb the unknown gas, and if he was right, he should find himself able now to speak a lie if he wanted to.

He determined to test that and went to the window to call a newsboy. Before the boy reached the door, John took a silver dollar from a mass of smaller coins in his pocket.

"Can you change that?" he asked the boy. "It's the smallest coin I have."

The next moment he was exultant. He had told a lie! He was the only man in the world now able to speak other than the truth!

He dismissed the boy, took out the absorbent pellets and thrust them into his pocket, and then sprang to the telephone.

"I want you to trace a call I received an hour ago," he told the operator. "It is vitally important."

Ten minutes later the operator told him, "Your party called from White Silver Lake, Vermont."

John wasted no time with trains or automobiles but chartered a plane and an hour later was flying through the afternoon sunlight toward the village in northern Vermont.

His tension was extreme. Up there in the wilds of that isolated region, Doctor Rand must somehow be pouring that fatal truth gas into the atmosphere. And unless he were halted, everything in the world was going to rot from too much truth-telling.

Even now it might be too late, but he did not think it was. If the outpouring of the gas were only halted, if people and governments were only able to use a little discretion again in their speech, complete world-disaster might be averted.

White Silver Lake proved a tiny huddle of a dozen white frame cottages beside the lake that named the place. In the country store that had the only telephone in the place, John described Doctor Rand.

"Sure, he come here months ago and set up work at the old bauxite mine back in the hills," the storekeeper told him.

"He's doin' some kind of refining there, they say. Had machinery and stuff sent in and put up, and stays there alone now workin'."

Daly got directions from him and hired a rickety flivver that took him back through the sunset-lit hills by precarious roads. As he neared the valley to which he had been directed, a roaring sound came to his ears, growing louder as he advanced.

He emerged into a long green valley scarred on one slope by the site of an old mine, rickety buildings standing on naked brown rock. Machinery hummed now in some of the buildings, and from one a huge tube like a great metal nozzle projected forty feet up into the sky. From it came the steady roaring sound.

John stopped the car and hastened toward the building of the nozzle. He saw no one until, when he was ten feet from the door, Doctor Jason Rand stepped out and covered him with an ugly revolver.

"I've been rather expecting you to come and have watched for you, Daly," he said.

"You see, I knew you were the only person in the world who might guess what I'm doing."

"You *are* doing it, then?" exclaimed John. "It's you that's brought this terror on the world?"

"Terror?" repeated Jason Rand. "It's the greatest gift anyone has ever made to humanity: this necessity for telling the truth.

"It was your suggestion about the truth serum that started it, too, Daly. I wondered if the thing could be done on a large scale and that very afternoon started investigating truth serums. I found them mostly ineffectual experiments, but saw how a completely effective compound could be produced in gaseous form and made so powerful that a tiny proportion of it in the atmosphere would affect everyone breathing.

"This place had the natural ores I needed for production of the truth gas so I came here and have been releasing it into the atmosphere at a steady rate. To make sure it was working, I called you, and found it was. As long as it's poured out into the air here, the world must speak the truth. And as long as the truth is spoken, the world's troubles will be at an end."

"You don't know what you're talking about!" John cried. "This stuff you're pouring into the atmosphere is ruining civilization. Business is dying, families breaking up by millions, friends being estranged, nations on the brink of war with each other.

"Myself, I've lost the girl I love simply because I blurted out needless truth to her. And all this because of this horrible curse of truthfulness. You've got to stop releasing this stuff!"

"Nonsense!" snapped Jason Rand. "The conditions you mention are only temporary confusion. In due time they'll pass away."

"I tell you, they're getting worse every day and they'll soon reach complete chaos," Daly cried. "You must stop this thing, now! If you don't, I'll make you!"

● John took a desperate step forward but Jason Rand raised his pistol threateningly.

"Not so fast, my young friend! I'm not going to have my great work interrupted by your blind foolishness. You walk ahead of me into that building. I'm going to tie you up and keep you confined here for safety's sake."

"But won't you quit this—" John began, but was quieted by a command.

"Not another word, Daly. You march!"

Daly's heart sank as he walked ahead of the scientist into the building. Mentally he cursed the pig-headed chemist who was single-handedly wrecking the social fabric of the world.

His hands explored his pockets desperately for some weapon but found none. Then his fingers touched something that gave him sudden inspiration and hope, two little pellets of absorbent cotton—the pellets he had used in his nostrils when testing the air! They gave him an idea and he took them quickly out and under pretext of brushing his face, slipped them into his nostrils.

He stood then amid the looming machinery of the old building while Jason Rand, still keeping him covered, brought ropes.

"Doctor Rand," said John, "I guess I was a little hasty, after all. I'm beginning to think you're doing a great work."

Rand stopped and stared suspiciously at him. "You are? What made you change your mind so suddenly?"

"Well, it was what you said about the present state of things being only temporary," John Daly lied splendidly. "It seems to me that you're right and that the world will be better off in the end. I'd like to help you in this great work of producing the truth gas. I've only the greatest desire to help and I assure you I no longer have any wish to stop you."

Jason Rand looked puzzled. "This is certainly a sudden change of heart," he said. "If it were not that lying is now impossible, I'd think you were lying. But since I know you must be telling the truth, I'm glad to hear you say it. And

I welcome you to carry on this great work with me, my boy."

He put the pistol back into his pocket and extended his hand. Instantly John jumped for him.

Two minutes later he had the pistol and a dishevelled Jason Rand was contemplating him stupidly.

"But you told me—" he stammered.

"I told you a lie," John admitted, and took the pellets from his nostrils and showed them.

"That's how I did it. And now, Doctor, *you're* going to be tied up while I start wrecking this devil's device of yours."

Two hours later the plant was very thoroughly wrecked and Daly untied the cramped, bitter Jason Rand. He locked the chemist up in his room, found another, and went to sleep.

It was evening of the next day when he and the angry, bristling Rand reached New York again. The chaotic confusion there seemed quieted now, but when Rand saw the evidences of its recent existence, he appeared not so furious as at first.

The newspapers' late editions were screaming the news that this sudden wave of what they called "uncontrolled speech" had receded as strangely as it had come. People, they said, were no longer saying things they didn't want to.

As he and Rand went to the laboratory, Daly heard the blade-vendor shouting aloud, "Blades that wear almost forever, men! The bargain of the age!"

He heard a passing man tell the faded woman beside him, "Now, dear, you know you're as good-looking as ever."

He saw a sign on a newspaper-stand that cried, "President Predicts Boom Business—Stock Market Rises Again!"

Another placard stated, "War Scare Quiets as Japan Affirms Desire for Peace!"

"It looks like everything's almost normal again," said John. Jason Rand maintained a dour silence.

● At the laboratory they found a newspaper reporter waiting for Rand.

"Doctor Rand, we'd like a statement from you as from our other great scientists about this recent wave of mental aberration in speech," he said snappily. "It's been suggested that some person might somehow have caused all this, and that he ought to be hunted down and hung. Do you think such a thing is possible?"

Jason Rand's eyes shifted from the reporter's expectant face to John Daly, and back again to the reporter.

He coughed. "I think," he said impressively, "that the idea is sheer nonsense. No person could cause a thing like that."

"Just what every other scientist thinks," said the reporter. "Thanks for your word on it, Doc, and so long."

He left and Jason Rand looked a little guiltily at his assistant.

"After all," he said, "there are times when the strict truth is not exactly advisable."

John nodded. "We'll say no more about it," Rand told him with dignity. "But try to be on time in the morning."

John went out grinning. Within a half-hour he was walking up the steps of the Lane home. Wilson Lane met him on the porch, his chubby face wearing an ominous frown.

"I thought I told you never to come here again, Daly," he greeted him.

"Mr. Lane, I came to apologize," John said earnestly. "That night I spoke insultingly to you I had been drinking a little and didn't know what I was doing. It was the same when I telephoned. But since then I've realized what a fool I made of myself and want your forgiveness."

Wilson Lane eyed him warily. "You don't consider me an old fussbudget, then?"

John laughed and put his hand on his shoulder. "You? Of course not. I only hope that twenty years from now I'll be as good a sport as you are, sir!"

The chubby father of Lois beamed. "That's fine, John. I'm glad to see you're yourself again. Lois is back in the garden. Suppose you make it up with her, too."

John found her there, but at the sight

of him, she walked rapidly toward the house.

He caught her arm. "Lois, listen! I must have been crazy to tease you like that. I'm so sorry."

She stopped and turned to face him, blue eyes serious. "You were only teasing, then? You really like my dress?"

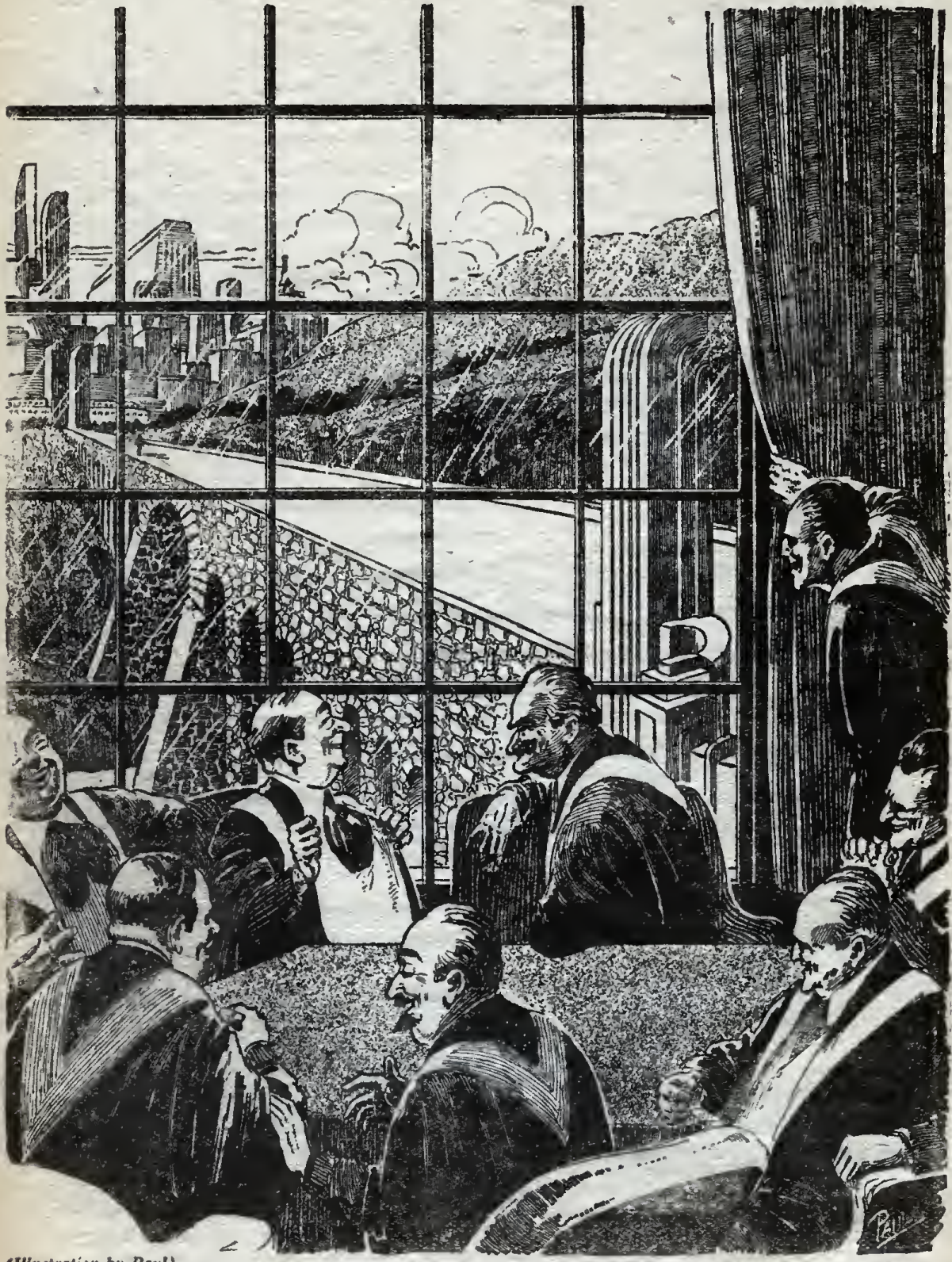
"Like it?" he exclaimed. "Why, I was crazy about it. I want you to wear it all the time."

"John, I'm so happy!" she exclaimed long minutes later when he released her. Then she asked, "Why are you sniffing the air like that?"

"I was just wondering if there were any chance of—but I guess it's all gone and everything's safe," he answered to her mystification.

"But as I was telling you, I really thought your dress was wonderful. But then you look swell in *anything*, Lois—"

THE END



(Illustration by Paul)

They waited until he was a little speck on the bridge; then they started to laugh.

THE LIFE DETOUR

By DAVID H. KELLER, M.D.

● In our June issue of 1934 we reprinted, as a filler, an excerpt from the *New York Times* concerning the newly discovered "heavy water"—which is just ordinary water in appearance, but contains a double hydrogen atom. Very little of this has been isolated so far, and it is worth several thousand dollars per ounce.

The article suggested that heavy water plays an important part in the life processes of all creatures—citing possibilities more fantastic than many a science-fiction theme.

Dr. Keller, a great favorite with our readers, saw the makings of a good story in this idea, and, inspired by the above-mentioned article, penned "The Life Detour," which you will find an original and scientifically possible tale of unusual merit—a typical "Kelleryarn."

● "Thanks!"

"No need of thanking me," insisted Primus. "There is only one reason for your being invited to come over the Bridge, and that is your own ability. The Upperons are always anxious to advance any of the Otherons who show their ability to add to the welfare of our city. Our promotion experts have had you in mind for some time. Your work in electrochemistry has more than excited our admiration; in fact, we are all slightly envious of your ability to do the things that most of us can only imagine in our dreams. Here is your permit to cross the Bridge and stay across. Congratulations! I believe that still greater honors are in store for you."

The young scientist looked out of the window. He was on the upper story of a tall building erected on the top of a mountain. Far below him, across a chasm, was the other part of the city, the home of the Otherons. Connecting the two sections was a Bridge flung like a spider's thread, glistening in the sunlight, beautifully clean, as all the city was.

It was the Bridge.

Every Otheron child was taught that perhaps some day he might cross that bridge. Every Otheron mother hoped that her son would be found worthy of such an honor. Now and then some one did; not often, but frequently enough to keep hope alive in the hearts of the workers.

Slowly through the decades, each filled with more advancement than past centuries, cities like Victorus had developed. Slowly there had come a cleavage between the workers and the rulers, the voters and the politicians, those who made wealth and those who saved it. Increase in knowledge had brought freedom from disease, machinery had liberated muscles, and abundant leisure had given opportunity for interesting hours of study and happy hours of play. The city was clean; the people were clean, all lives being relatively luxurious. But in spite of everything the Bridge had slowly been built, first as a symbol, then as a concrete idea, and at last as a shining, shimmering reality.

The slaves and nobles, the workers and the merchants, the voters and the politicians had slowly, by a process of social evolution, changed into the Upperons and the Otherons. There was not much difference between their physiological existence, but their spiritual lives held nothing in common. The only bond between them was the Bridge.

● Henry Cecil walked back across the Bridge. It was the law that when the Otherons were called to Primus they had to walk. The young inventor, living in the shadow of the Bridge all his life, had not been on it till that day. Till then it

had been only a thing of beauty, rainbowed across the sky. He had dreamed of crossing it; he had even daydreamed of the time when he would become an Upperon. Now he was actually on it, going back home, back to his family, back to the girl who had inspired him upward in his electrical researches. He was happy. It was not only a rainbow with a pot of gold at the other end, but he had crossed and found the treasure. Now he was going back to tell how the almost impossible had become reality.

From the office window, Primus watched the boy, just a speck moving along the top of the Bridge. Primus was smiling. He had reason to smile. Something that he had been waiting for a long time had happened. Not having the intelligence to force the answer, he had to wait till someone else found it for him. Once found, he had imagination enough to use the information. It was imagination that had made him Primus, in fact, it was just that psychological quality, the ability to keep one jump ahead, to see what was going to come before it did come, that had enabled the Upperons to become what they were.

He pushed a few buttons, calling the Decimals to his office. These ten, with Primus at their head, ruled Victorus. Up to the present time, the wisdom of their rule was shown by the fact that they were still rulers. Otherwise, they could not have survived.

"The time has come!" he said briefly, with a smile. They all knew what he meant. It had been their dream for years, not often spoken of, rarely discussed, yet never far from their consciousness. Now, with opportunity in his grasp, the instrument in his hands, Primus felt that there was no longer need of hesitant speech or delayed action.

"Modern machinery has so simplified the mechanics of life," he began, "that there is no longer any real need for the Otherons in the future social structure. Yet there they are. We have looked after their every need, safeguarded their health, provided for them so amply that they have simply survived. Contraception might have served our purpose, but we did not provide for the survival of the maternal instinct. The old-fashioned ideas concerning love and family, home and children, survived rather, much as the old ideas of magic and religion. Thus we had the unique experience of seeing a part of life live on when it really had survived its usefulness. Unfortunately for us, the moral code was so much a part of our personality that no one could consider wholesale murder for a moment, deliberate race destruction. I am sure that none of you would entertain such an idea for a second. Yet, there was always the danger that someone of them would tire of a life of perfect social servitude and long for one of imperfect social freedom, if you understand what I mean. Can you imagine the result of *all the Otherons wanting to cross the Bridge at the same time?* So far, they have had the intelligence to do so if they wanted to, but none of them have had the imagination to see what would happen if they did. The thought has at times caused me insomnia. Now I have the solution. The time has come for action!"

"What is the method?" asked one of the Decimals.

"Very simple," was the quiet answer. "All the luxuries, all the necessities, clothing, food, entertainment, even the conditioned air used in the twenty-four-hour day of the Otherons, come indirectly from us. As humanitarians, philanthropists, we want to see them well cared for. We have allowed them to benefit from every new invention, every scientific attainment. I intend to do just this—once more."

"Do you mean that you are going to be kind to them?" asked a Decimal.

"Exactly. I am going to give them a better form of water to drink—*heavy water*. Since you are not real scientists, that will have to be explained to you. Today I issued a permit to Henry Cecil, a brilliant Otheron, to cross the Bridge. He will meet with us tomorrow, and tell us all about it. The wonderful young man has intelligence but no imagination; so, he has

not the slightest idea as to what it is all about. That will be all for today. You can spend the next day trying to imagine what life will really mean to us if our problem is solved."

"I suppose there is no other way," whispered a Decimal. "Still, there are nearly one hundred thousand of them, and some of them seem to be rather interesting personalities."

"But they are not Upperons!" retorted Primus sharply.

"No, I admit that—just Otherons."

"They have ceased to fight," cried Primus. "They have become contented. All contented life has to die. And remember this. Someday the decision will have to be reached. Either we die, or they do. Victorus is not large enough for both of us. The Bridge is not strong enough to save us if they develop imagination."

"It looks strong to me," answered a Decimal, "but I suppose if they all had the same idea at the same time, anything might happen—"

"To us!" cried Primus, finishing the sentence. "Tomorrow at two we will meet here with Henry Cecil and listen to his lecture on his new discovery."

● The young inventor was warmly greeted by Primus and the Decimals. They welcomed him as a new Upperon. One Decimal patted him on the back; another prophesied that some day he would be found worthy to become a Decimal.

The young man knew his history. He thought that his present position was almost equal to that of the old-time United States Senator, when there was a United States and Senators.

Everybody was seated comfortably. They even made the young inventor occupy a chair.

"Now tell us all about it, Professor," said Primus, jovially. "Put it in simple language, something that can be understood by the sixteen-year old mind. You see, we are not highly educated as you Otherons are."

"There is not much to say," replied the inventor. He really looked like a boy in comparison with the eleven hard-faced business men who faced him. "Water, as you all know, is simply H_2O — two parts of hydrogen and one part of oxygen. One day some of us found that there was a hydrogen of double atomic weight and we called that Deuterium. It combined with oxygen just as the light hydrogen did and produced water, only it was heavy water. If we use D for the symbol of the new hydrogen, then the formula for the new water would be D_2O instead of H_2O. Still water, you understand, but different. Naturally, we wanted to find if this new water existed in nature or was only a laboratory novelty. We found that in every five thousand gallons of ordinary water, one gallon could be separated of the heavy water. When water was taken from different places, the proportion was different. Sea water from the depths, half a mile under the surface, contained much more than rain water. Of course, we could make it in the laboratory, but it was expensive; about $6,000 to produce one pint. We even found that there was a water containing three parts of hydrogen. There was one gallon of that to every billion gallons of water. After the work was finished, I sent in the usual report and almost forgot about it, till the order came to find some method of manufacturing it in large amounts. It was a little intricate, but I finally was able to tear some Deuterium into two parts. One part I used as a target and the other part, converted into deutons, served as bullets to fire at the target. That speeded the process up, increased the amount of heavy water and lowered the cost. I have a machine in mind that can be attached to the water plant of Victorus so that all the water can be converted into heavy water as it flows into the distributing pipes."

"That is fine!" commented Primus. "And who are the *we* you speak of as doing all this work?"

Cecil laughed.

"As a matter of fact," he replied, almost bashfully, "I did most of the work myself. There are very few men in our laboratory that have cared to bother much

with these higher types of electro-chemical study."

"Just as I thought. You are the one who deserves all the credit, and I am glad that you were recognized as being worthy to pass over the Bridge. Now, what will this heavy water do, if a person drinks it all the time?"

"I don't know. I have been so busy working out the scientific side of its manufacture on a large scale that I never thought of its use. I suppose it is just like any other water, but much—I know what it will do! It has powerful germicidal properties."

"Fine! Wonderful! The very thing!" almost shouted Primus. "A water that is a powerful germicide, circulating through every part of the body, destroying germs of every kind, killing all new growths, a panacea that will prolong life. You will go down in history as one of the great benefactors to mankind. You go back to the water works and build your apparatus so that the water can be changed. For the time being, only use it on the supply going to the Otherons. They are our special responsibility. The welfare of Victorus depends on their welfare. For the time being, we Upperons will drink the old-fashioned water. Now, is there anything we can do for you? Any special favor you want to ask?"

The young man blushed, as he almost whispered his answer. "Indeed there is. You see, I am in love. Wonderful young woman. Perhaps you gentlemen know what it is to be in love? If I cross the Bridge and leave her on the other side, it will be the end of everything. Why, I cannot do my best work, thinking she is unhappy. I wonder if you could let her cross the Bridge? Then we could both be Upperons, happy Upperons."

Primus smiled. "We will think it over. In spite of our age, the Decimals and I were once young. The idea is unusual, but it may be arranged, my boy, it may be arranged. Now, hurry back and give the Otherons their supply of heavy water as soon as you can. And we will be seeing you soon."

They waited till he had left the room, kept silent till they saw him hasten across the Bridge, waited till he vanished, a little speck on the other side.

Then they started to laugh—just hearty, masculine laughter.

"A perfect fool!" cried Primus, between his gales of merriment. "He thinks that the world is his oyster and all he has to do is to open it."

Suddenly one of the Decimals stopped laughing. He almost looked sober.

"What would happen if he found out your intentions, Primus?" he asked.

"He won't!" sneered Primus, laughing on. "He hasn't enough imagination."

● Henry Cecil started to work in earnest. He worked all day and part of the night, but found time to see a little of Ruth Fanning, the young woman he wanted some day to take over the Bridge with him. Instead of love, he talked to her about his work; instead of kissing her, he drew pictures of his new machinery on the tablecloth. Finally she did not know whether he was in love with her or heavy water. But that did not stop his enthusiasm for his laboratory or his love for her. He even brought her a four-ounce bottle of the new product.

"Look at it, Ruth," he said. "Just a little there, but do you know what it means to us? Suppose you try to imagine a lot of it, a river of it, and on that river will float a little boat on and on till we finally live with the Upperons. It is not a Bridge that will take us there, my dear, but a stream of my heavy water."

"I am not sure that we shall be happier as Upperons," she sighed.

"Nonsense! Why, everybody is happier when they are Upperons."

"Why are they so anxious to change the water they give us?"

"So that we shall be healthier, live longer. It is an ideal medicine, almost a panacea. You ought to see it kill germs in a test tube."

"Are *they* going to drink it?"

"Certainly, but Primus told me to give the first supply to the Otherons. There

is a grand man, Ruth; I want you to meet him. You know, he is really a human being. We Otherons have had a wrong idea about him and the Decimals. They are doing everything they can to make life pleasant and sweet for everyone in Victorus. Must be going. I will be over tomorrow evening. In about one week the rush will be over and then we can talk about that boat trip—you know—symbolic trip, on the stream of heavy water. We will amount to something when we are Upperons."

Ruth Fanning smiled a little sadly as she watched him leave the house. She wondered if the Upperon ladies played good contract bridge and just how they dressed. She had never been over the Bridge.

● A week later Primus and the Decimals visited the waterworks of Victorus in company with Henry Cecil. The inventor explained everything to them. The machinery to make heavy water in large amounts was complete. All that was necessary was to start it by pressing a button. Primus thought that there should be some public ceremony in which Cecil could be thanked for his contribution to the health of the city. Cecil begged to be excused. So, it was finally decided that nothing should be said. The inventor on a certain day should press the button and keep still. Proper public recognition would come in time. He was to press the button and then marry and go on an extended honeymoon, after which, he and his bride were to cross the Bridge and stay across.

Back in the private office of Primus, one of the Decimals took him to one side and asked, "What will Cecil do when he comes back at the end of the month and finds out what has happened to the Otherons?"

"I imagine that he will kill himself," was the smooth reply. "If he fails to do it, something else will happen to him. I will think it over."

● Ruth Fanning had two kittens. That was one of the atavistic traits of the Otherons; they remained fond of pets. She also had imagination. That was something that was not suspected. Hardly any of the Otherons possessed this peculiar psychological trait. It was almost unknown. Generation after generation had led such perfect mechanical lives, that the idea of looking forward to see what might happen rarely occurred to them.

Ruth Fanning had two kittens, imagination, and four ounces of heavy water. As soon as Henry Cecil left, she started to combine the three things. She took one kitten and placed it in a cage in her bedroom and she took the other kitten and placed it in another cage in her bedroom. She treated both kittens alike, but three times a day she mixed with the milk one kitten received a teaspoonful of heavy water. The first dose was given when the family was away from home. It was a good thing. The kitten was certainly a happy little thing. It jumped, played, turned somersaults and had the best time a kitten could possibly have. It had energy enough for ten kittens, and it made a lot of enthusiastic, melodious noises. Ruth had never seen a kitten act that way. Even the other kitten was astonished at the unusual feline conduct. Ruth made notes on a tablet. She was more than interested. But she did not tell Henry Cecil. Five days later he told her the final details of his plan. The machinery was finished. The room it was in was locked and sealed. Everything was automatic and would run for one month without human interference or supervision. Two days later he would press the button, lock and seal the room, marry her, and they would go to Asia for twenty-eight days of pleasure. On their return they would become really, truly, Upperons for the rest of their lives. Primus was going to pay all the expenses for the month.

It was then that Ruth said, "Do you remember my two kittens?"

"Yes, I do seem to remember that you had two, but I have not been seeing them lately."

"I have them in cages up in my room. Come up and look at them."

In one cage Cecil saw a kitten, just a

little, playful kitten, but rather unhappy and lonely and not enjoying the confinement. In the other cage was a cat, an old cat, that looked as though she had lost eight of her nine lives.

"I thought you said you had two kittens, Ruth?" he asked.

"I had, five days ago, but something has happened to one of them. Here are my notes. The poor thing has aged ten years in five days."

The inventor sat down and read the notes. He read the entries made three times a day; he looked at the cats. Then he read Ruth's notes all over again. Suddenly he jumped up and shouted, "Well, I'll be—"

"Don't swear, Henry," pleaded Ruth. "That will not help any. Just try to think what it means. Use your imagination."

"It is too late. What a fool I was! Decimals patting me on the back and telling me what a great mind I had. Primus offering to pay for our wedding trip and urging me not to hurry back, suggesting that I have the door to the machine-room locked and sealed and take the key with me. *Do you know what they intended to do to the Otherons?*"

"What happened to the cat?"

"They cannot do this to me!" cried the enraged man. "Make a fool and a murderer out of me! I am going across the Bridge and tell them a thing or two."

"No. You will do nothing of the kind. You would never come back. You go on with your plans, only change something or other, so they will be disappointed."

He banged his fist on the cage so hard that the senile cat jumped.

"I have it!" he shouted. "Everything will go through just as it has been arranged for. We will even have our trip. Just you go on sewing and leave it to me, Ruth; leave it to me."

"I knew you would be able to think of something. You are a real inventor, Henry."

"I'll say I am," he replied, kissing her, then dashing out of the room.

● Two days later Henry Cecil and Ruth Fanning walked across the Bridge. They went directly to see Primus. He was waiting for them, alone.

"I have come to report, sir," said the inventor, "that all of your orders have been carried out. The machinery to make heavy water has been started, the room locked and sealed. I have the only key and I am taking it with me. Now if there is nothing more, we will be married and start for Asia. And thank you very much for your kindness to both of us, sir."

The great man fairly beamed his happiness as he folded his effusive benevolence around them like a cloud with a golden lining.

"You have deserved all we have done for you and your beautiful bride, my dear boy," he said. "And one thing more: one of the Decimals is thinking of retiring from public life. You are being spoken of as being a proper person to take his place. How does that suit you? Mrs. Cecil will be in her proper place then; lots of the Upperon ladies will be glad to entertain her. She is Upperon class, my boy; I can see that at once. Call on our treasurer for funds, and do not stint yourself. I want you to have a wonderful time. Good-bye, and good luck to you."

They left him after expressing their thanks.

"A wonderful man. He certainly has imagination," whispered Ruth.

"Not quite as much as you have," answered Henry, also in a whisper, "but I think that we had better start for Asia just as fast as we can."

● Thirty days later they returned to Victorus and went at once to Ruth's home. Her parents welcomed her.

"Anything new?" she asked. "You certainly look well."

Mrs. Fanning insisted that she had never felt better. Mr. Fanning said that there was no special news except that the Upperons were somewhat quiet and keeping to themselves, but that the Otherons were taking care of their part of the city with their usual efficiency.

No one had crossed the Bridge; so, there was no news. One of Ruth's cats was dead, but the other was growing nicely.

The young people looked at each other.

The next morning the young inventor suggested to his bride that they take a walk. She was ready for a little exercise, but was somewhat surprised when she found where he was going.

"I have to go," he insisted, "and you have to go with me. I never like to start any experiment without finishing it. I suppose it is my scientific complex. I not only *want* to know what has happened to the Upperons, but I *must* know. It may be dangerous, but I doubt it. Somebody has to go, and who else should it be but the two of us?"

They reached the Bridge and walked without a pause till they reached the center. There, poised over the chasm, they stopped and leaned on the guard rail. It was a beautiful spring morning. Far below, a mountain stream complained of its having to keep on dashing aimlessly to the sea. Just above them a robin had built a nest in the heavy wires. Around them was silence, thick, intangible, peculiar.

"It is so still here," whispered the woman.

"It is always still, but today it is oppressive," replied her husband.

They went on into the city of the Upperons. No one was on the streets. No one seemed to be in the magnificent castle, the upper floor of which served as an office for Primus. No one answered the push button calling for the elevator.

"We shall have to walk," at last explained Cecil. "I know where the steps are, because I ran down them once; I was so anxious to get back to you and tell you that I had my pass and was going to be an Upperon that I could not wait for the elevator. Come on. It is only twenty-five stories."

No one in the waiting room, no one in the inside office, and then! At his desk sat Primus.

He was an old man, in fact, a very old man. Everything was old about him except his eyes. They had the hatred of youth in their venomous gleam.

"So, you have come back, Cecil?" he asked. "I knew you would."

"Yes, sir," answered the inventor. "You see, the vacation was over; so, I had to come back and go to work again. I am reporting for duty and there seemed to be no one to report to but you, sir."

"I was waiting for you," whispered the shaking senile sullenly. "I knew you would come. I was waiting for you. The others all died, but I kept on living on bottled grapejuice and crackers, waiting till you came back. If you had stayed, you would have laughed as loudly as the rest. It was a madhouse for the first few days. Every Upperon was laughing. They were as happy as human beings could be. They were so happy that they could not be serious and find out what they were happy about. Upperons, who had never laughed, were splitting their sides over nothing at all. For a little while I tried to give orders, tried to make them stop drinking the water, after I suspected what you had done, but they thought it a great joke. Laughing water, that is what they called it. They stopped their alcoholics and got a better kick out of the water, and then they went back to their houses and lost interest and grew old and died. Think of it! Every Upperon died of old age in a month, all except me, and I guess I am done for. What did you do to us, Cecil? You didn't have time to do much. My experts inspected the machinery just before you started it. It was all right then."

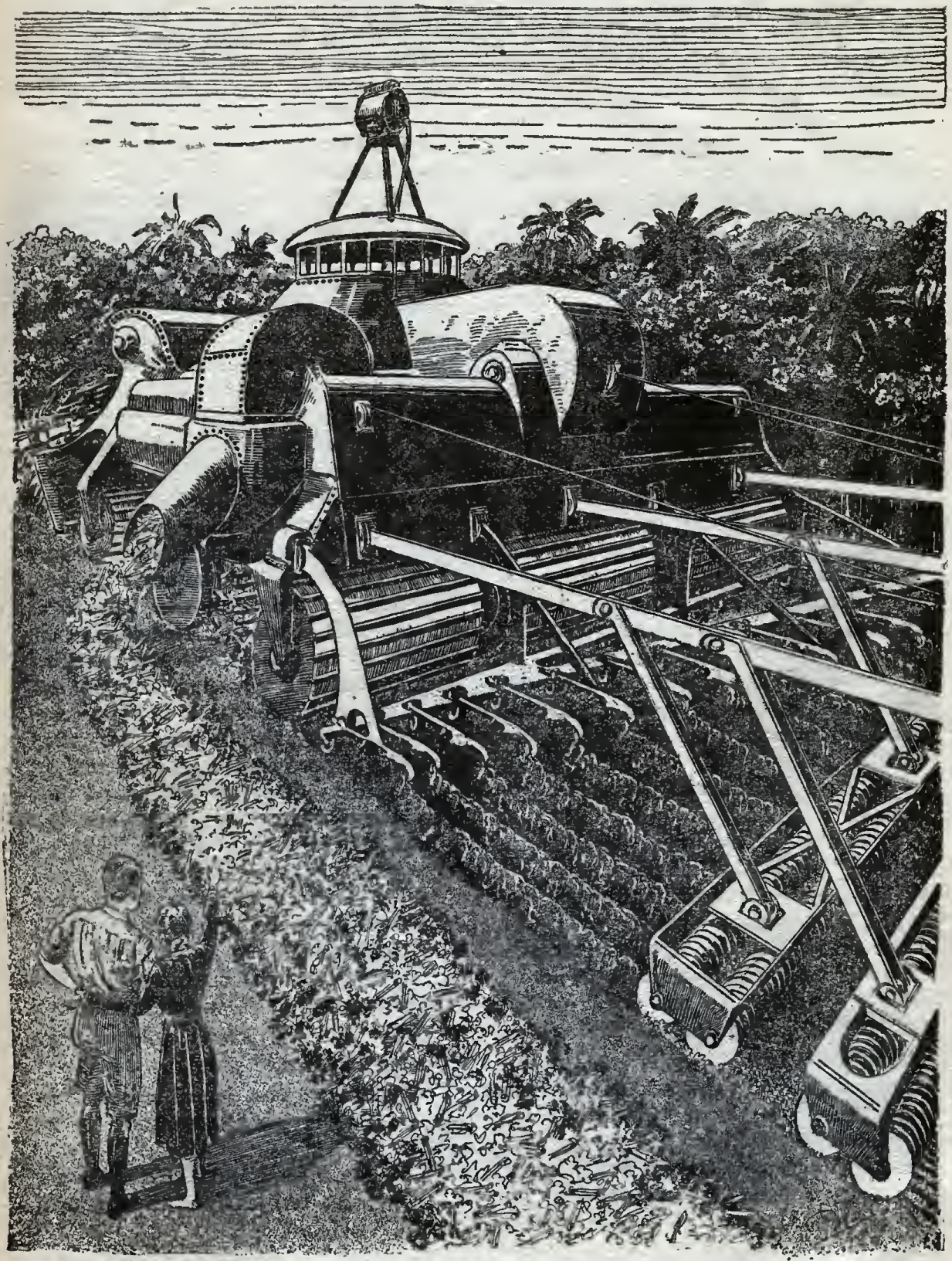
"What did you intend doing to the Otherons, Primus?"

"Whatever it was, it was not to happen to us. Did the Otherons die as we did?"

"Oh! No, indeed," answered the woman. "You see, they kept on drinking plain water."

"It was this way, Primus," explained Henry Cecil, and there was a certain sympathy in his voice. "Ruth had imagination and she put that and four ounces of

(Continued on page 1127)



(Illustration by Paul)

Everything was silent but the clatter and clang of the machine. Not a soul was to be seen.

THE HIDDEN COLONY

By OTFRID Von HANSTEIN

(Translated from the German by Fletcher Pratt)

PART TWO

● We almost feel like asking your pardon for ending last month's instalment at such a critical point, but then again, it will make you approach this month's chapters with added enthusiasm and anticipation.

In Part Two we really get down to the story, whereas Part One presented the atmosphere of the story and built up the suspense, besides showing us the two main characters in their real natures undergoing trials not often equalled.

We know that they are lost in the jungles of Yucatan, though they have never given up hope. Each night they have heard strange whistlings and noises that they are sure can be made by no animal in the jungles or by the instruments of man. We are now to find out all about these eery sounds—they are to bloom into exciting adventures and amazing occurrences that make this tale a real science-fiction classic.

WHAT HAS GONE BEFORE:

● The hero of the story, a young doctor, who speaks in the first person, is commissioned by a friend to bring Lena Aporius home to her family in Germany, from San Francisco. Lena had been left there with her mother when they learned of the death of her father, Wenzel Aporius, called "the German Edison," in a shipwreck. Then Mrs. Aporius died of yellow fever. The doctor falls in love with Lena at sight, but of course conceals his emotions. She wants to fly over Central America, where her father's ship had been wrecked, and then take a boat from Havana home. She believes that her father is still alive somewhere. When flying over Yucatan, the plane is wrecked, and the man and girl find themselves stranded in the jungles. However, the girl feels as though her father is somewhere near, and she recognizes the surroundings as those of her dreams—dreams that would lead her to her father, and the doctor had been the young man who had accompanied her in her dreams. As their food is getting low and they fear attack from Indians, the girl feels sure that they will be preserved and locate the great Wenzel Aporius. Every night they hear peculiar sounds which can come from no animal native to Central America, and we are left in perplexity over these noises, at the close of Part One. *Now go on with the story:*

CHAPTER III

(Continued)

● Then it became lighter. The frightful something that howled, stamped, and crashed through the trees, on the other side of the river, seemed to be going away again, and gradually its sounds sank into silence.

We looked at each other, words seeming unnecessary. We knew that although we could find no certain explanation for the accumulation of sounds, it must be some living being, since it had approached and then gone away again, and in the dark on top of that stone it seemed as though daylight would never come. Naturally, under the roof of the jungle dawn, it came more slowly than it had when we were in the open.

And now all the animals seemed to wake again at the approach of day. As I looked around in the half-light of the dawn, I could make out the head of a brilliantly colored snake, lifting itself questioningly right at the side of our refuge. It was all dripping with damp there under the trees. The vegetation held the water of the night rain longer, and the nearness of the river made the ground marshy all about. Little mangrove plants lifted their bizarre branches up out of the damp, like pipes.

The air was filled with damp and felt unhealthy. I looked at Lena. Now that the sun had risen and the life of the day

had awakened, she had fallen into a doze. During the night neither of us had been able to close our eyes. I reached over, and with the machete which I, like everyone, had borne away from Merida, struck off the head of a snake at a single blow, and the activity made me feel better. Lena had loosened the bandages around her feet, and I noticed how wounded and painful they were. It would be impossible for her to go farther on foot. And I myself felt weak; it was only natural. Since yesterday's breakfast, we had had nothing to eat but a few pineapples and some curious tropical fruits with leathery hides and pulpy interiors.

And we had very little chance of getting anything better.

I could hardly go hunting with a revolver as my only weapon, and for that matter, even if I had had a better weapon, what was there to hunt except a few monkeys and parrots?

Of course there were some marsh-birds running about among the mangrove roots, but even if I shot one or two of them how would I get them afterward? I laid the blanket carefully over Lena and leaped down from the rock. And then the thought came to me that she might awaken and slip. I climbed among the stones of the bank to the side of the river. It was very broad and quiet, running away straight eastward toward the sea. Up above, it must have come over a fall somewhere at a point hidden behind the trees, for I could hear the rush of waters. At first, in my search for food, I plucked a few more pineapples, but their pungent white flesh tasted somehow repulsive; I was hungry for something solid and filling. I looked at the river. There were doubtless plenty of fish there, but I had no means of getting at them. I was considering how I might improvise some kind of a fish-line when I noticed a big turtle at the edge of the bank. Taking off my shoes and stockings, with caution I crept up on the animal and succeeded in grabbing him with a quick spring and turning him over on his back. The short hunt had so taken up my attention that I had not noticed the man. He was all alone, seated in a cayuco, the dug-out canoe of the Mexican Indians. He had swung it in toward the bank, doubtless to make a portage around the cataract that lay above, and now sat looking at me through the tangling mangrove roots.

The Indian gripped for his machete. I beckoned to him and spoke a few Spanish words. Fortunately he understood. He was a single, poor Indian of the forests. certainly not on the warpath. I tossed him the couple of coins I had in my pocket. Indians are never so far from any human habitation as to make money altogether worthless to them, even in the wilds of Yucatan, and this one evidently understood the purpose of the gift, for he grinned as he stuck the money in his belt.

"What river is this?"

"El Talum."

I had guessed right about it.

"I have lost my way. Will you help me build a raft, and can you tell me where this river goes?"

The man looked frightened and shook his head.

"Chan Santa Cruz."

He could hardly mean the city, since that must lie considerably to the south, but it was quite likely that right through to the coast tribes of this wild stock roamed the jungles along El Talum.

I pointed toward the northeast.

"How far to Valladolid?"

He lifted five fingers of one hand and pointed to the sun.

"Five days' journey?"

He nodded.

"Are there any encampments or houses of good Indians along the way?"

"Bad land! Wild!"

"And what is in that direction, on the other side of the river?"

I had been wondering why the man had not pulled in to the opposite bank, since the brim of the river seemed much easier and more pleasant on that side, but he turned to me a face filled with panic terror.

"The country of the great enchanters!"

I laughed.

"Do any men live there?"

He shook his head.

"No more. The enchanters are all dead, killed by their own enchantments that they brought with them. Did you hear them scream in the night?"

"Have you ever seen them?"

● The man looked around suspiciously, then turned and gazed at me for a minute, reached down into the bottom of his canoe and picked up a double handful of gleaming fish which he threw to me, then with a wave of his paddle, sent the cayuco riding out into midstream, and began to drive it upstream at a vigorous pace without again turning around or paying any attention to the calls I sent after him. It was as though something had caused him to become suddenly fearful. Perhaps it was because I had spoken of the feared enchanters on the other bank.

I gathered up the fish he had thrown to me in the bight of the wrap, and tried to follow him along the bank.

The ground was rocky beneath and covered with absolutely impenetrable underbrush, in which mingled lianas, small, prickly cactus roots, and other clinging plants. It seemed impossible to penetrate farther; only an Indian, machete in hand, could have done it, so I soon gave it over and walked slowly back, stopping to pick up the turtle I had overturned. Lena was awake, sitting up and complaining softly.

"What's the matter?"

"I can't go on. My feet are all swollen and I feel so terribly weak."

I tried to force a laugh.

"Good. Then we'll have something to eat."

"But we haven't anything."

She spoke the words like a pouty child.

"Why not? Just let's make a fire and we'll have some turtle soup. After that, a few baked fish—"

"Where in the world did you get those?"

"At the fist market, obviously."

"Oh—you!"

"Head up, Miss Lena. Don't let's play out even if your feet do go back on you. We can't get on otherwise."

I had gathered some kindling together and the fire was already alight. Fortunately, I had often watched our Chinese cook prepare turtle soup while I was working at the Culebra Cut. It's almost ridiculous, but when a hungry man smells the odor of cooking soup in a kettle, he becomes stronger at once. Naturally, it was some time before we had everything ready, and for necessity's sake, the fish were simply cooked after the Indian fashion by burying them in the hot embers; they came out partly burned and at the best, badly cooked. But we found hunger an excellent sauce and ate with the best of appetites. And for dessert we had more pineapples, and when that was done, we sat down on the rock, hunger being followed by weariness, the result of our lost sleep. For three nights I had hardly slept at all, and would willingly have stretched out for a long rest.

But I knew that now a bad moment was coming for Lena. I had to tell her in how evil a position our affairs stood—we had before us either a journey down the river through the country of the savage Chan Santa Cruz, or upstream through the wild wastes that lay between us and Valladolid.

"Well, and what did you dream last night?"

I wanted to find some beginning for what I had to say, but she was sad.

"Nothing at all."

I glanced at her, a long, speculative glance. Too bad! I would almost rather that she had dreamed something about her father. Not that I believed in her dreams, but it would have encouraged her considerably.

"Or rather—it was queer—nothing, that I remember about. Nothing about my father."

I was silent for a few moments. It was not easy to say what I had to say.

Finally I mustered up my courage and laid the alternatives before her. To take the way down the river it was almost necessary that we build some kind of raft.

But this way might deliver us directly into the hands of the Chan Santa Cruz. On the other hand, we had the long march into the mountain country before us.

As to crossing the river and pushing on straight ahead, I did not consider the possibility, although this business of the "enchanters" seemed interesting. At the least there must be fierce animals of some kind there.

Lena nodded calmly.

"How can I march through the stony country for five days with feet like these? Is it certain that the Indians down stream are so bad?"

"I don't know for sure, but the reputation they bear is far from good."

She threw herself down upon the ground and wept a little.

"We must go up the river. Oh, why am I so weak?"

She was not bemoaning her own unhappiness. I believe that she had not even yet understood how serious was the position we were in. She mentioned that she herself had now lost the belief of finding her father now that she no longer dreamt of him. I stood up.

"Look, Lena, I must leave you alone for a few minutes again. We have no time to lose unless we wish to spend another night among these marshes, and I don't think that's a good idea."

"Don't bother about me. It's all the same to me what happens now."

That was the worst of all. If she had only continued to believe in finding her father, the weight of the load would have been taken off her shoulders. Now that the ideal she had cherished for so long was taken from her, her energy was all gone. I even felt annoyed that she should not dream, since she needed it so.

And yet—how in the world was I to drag her, weak, exhausted and without courage, through the wilderness?

I had gone down to the bank of the river again, sunk in my thoughts. What chances for a raft were there?

I looked around at the trees, but really they were all too tall and thick, quite impossible as building material. The land of the enchanters on the other shore beckoned. If I had been alone, instead of having Lena on my hands, I certainly would have dared whatever perils it held.

● I looked across. And when I looked, it seemed to me that everything over there was much more level and free of vegetation. There even seemed to be traces of a path. I decided I must get across and see what there was to it at least, and began to pull off my clothes and prepare for the adventure. But it was not in any light spirit that I began it. I had swum these wilderness streams before. What if I ran onto something and Lena Aporius were left alone in the jungle there, with no one to save her or take care of her? But I shook the thought angrily from my head. I had swum greater streams than this, and many times. I looked around again. Everything was quiet on the other side. Then, with one last look, I took the revolver in its water-proof holster between my teeth and plunged boldly in.

The current was strong. The nearness of the cataract made itself evident at once. I had to swim with all my strength, and even then I found it a struggle. But I finally reached shallow water, stood up, and looked around me. There were no footprints along the strand to show where an animal might have drunk—no tracks, no broken branches, no trampled grasses, no traces of any kind.

In spite of this negative encouragement, my heart beat fast as I clambered up the bank, clutching my revolver. I saw a curious sight. The forest had been destroyed in wide, even stretches, perhaps by some cataclysm of nature, although the borders of the clearing looked so sharp that they might almost have been made by the hand of man. In the cleared spaces, second growth was already taking possession again. It was a wild tangle of weeds and vegetation, a blooming, matted wilderness of underbrush difficult to pierce—bright green plants, many provided with long tearing thorns, and in the midst of them great red, yellow, and blue blossoms of

every conceivable shape — huge orchids, brilliant hibiscus, and underneath them coffee plants bending with the load of ripened fruit, and quantities of vanilla plants, their pods ready for bursting. A thousand penetrating odors filled the air.

It was curious, like a farm that had once been cultivated, and had not felt the hand of man for some time. Here in the tropics the gap was one that represented months instead of years, however, so rapidly did vegetation push forth.

I looked around, astonished, and then with still more surprise, saw through the clustering palm-trees the end of a gabled roof—a house! I tried to press on toward it, but found the clutching vegetation so packed that I had to cut my way, foot by foot, with the aid of the machete. The perspiration streamed down my forehead; I could feel it bursting out all over me. The little glade that, seen from the river, was only a few steps across, became on closer acquaintance half a mile or so wide, packed like a net and as difficult to get through. It covered the whole surface of this forgotten farm.

But even when I could no longer see its gable, I continued to struggle onward toward that beckoning house. Suddenly the character of the vegetation changed. A huge wall of cactus stood before me—a natural hedge—no it could not be; the cacti were too close together, too evenly in line. Back in the days when this place was inhabited, some human hand must have cleared a space and planted this wall there to keep out intruders.

With considerable effort I succeeded in hewing my way even through this obstacle. A free, stony space lay before me, ending in a little hillock, on the crest of which stood the house. It was a genuine well-built but small house, with a friendly and comfortable look about it. The roof was composed of wooden beams, and the whole surface of the building had been gaily decorated in red and green. There was a long, wide veranda around the building, and the whole place looked like a happy little hunting lodge, a pavilion in the wilderness. It was remarkable that anyone should have built such a structure in a place like this.

Almost involuntarily I ran up to the door and gazed around. As far as I could see in every direction, there was nothing but jungle all around. No—in the middle, there behind, there was a difference. Perhaps thirty feet behind the house, through the tangling vegetation, there lay a road, a broad, well-kept path of some kind—or, on second glance, it looked more like the narrow track of the apex of one of the tropical hurricanes which whirl through, tearing everything in their path. Or was it that the animal we had heard whistling and shrieking in the night had come this way?—the elephant or whatever it was. But how curious it was that it should make such an even, straight line, right through the tangle—never broader, never narrower, and as though a road had been deliberately cut. I regretted that I had not brought my glasses.

● I turned to the house itself. The door was closed only with a latch. I opened it and found myself in a little room. Windows, broken by a wooden grating, cut off the light. It was comfortably cool within. The furniture consisted of a small iron table, two chairs, one of which was provided with a leather seat, another table, and two hammocks such as are used for sleeping on ships that make tropical voyages. Against the wall was a cupboard with a few porcelain dishes in it, and a door with a mirror. I opened it; coffee, tea, rice, sugar, were inside. Everything was preserved in porcelain containers with little handles, kept fresh by this protection. I felt like shouting for joy. This was an unexpected piece of luck.

Quickly concluding my inspection, I went out again. I closed the door carefully behind me. I must bring Lena to show her what I had found. Then I thought once more of the frightening and unknown animal that haunted the neighborhood. But how stupid it was. If the house had remained there so long in perfect quietude, it certainly would afford adequate protection.

I looked at the sun. The devil! The job of cutting through the undergrowth and the cactus hedge had taken me longer than I thought and it was now long past mid-day. Lena would be worrying. I ran down to the river, feeling as though I ached in every bone. The effort of chopping through the jungle added to my sleepless nights had been a good deal for me. The return swim across the river did me good, although the current carried me further south than I wanted to go. I climbed up out of it, and stood, all dripping, then shouted.

"Lena!"

No answer.

"Lena!"

Filled with a sudden new anxiety, I raced toward the rock. She lay there, stretched out in the same position in which I had left her. I lifted her up. Her face looked pinched and was deadly pale. She might have been sunk in unquiet sleep.

"Lena, we are saved!"

She smiled sadly and painfully. I felt that she cared little whether she were saved or not, but she made a brave effort to smile at me.

"Have you made the raft?"

"Useless. I have discovered heaven!"

"Are you joking at such a moment?"

"Not a bit. You will see for yourself. We're going across the river."

She shuddered.

"To the wild animals that scream in the night?"

"They won't hurt us a bit. I beg you, get up and come along."

She wanted to make the effort to please me, but I noticed how her knees shook, and how much her feet evidently pained her.

"I'll carry you."

I took her by the arm, and pulled her along, half lifting her, and was astounded to discover how light she was. We were soon at the brink of the river.

"How will we get to the other side?"

"Do you know how to swim?"

"Yes, but—"

She was blushing deeply, and the same thought struck me. Nevertheless:

"You'll have to!"

I pulled my coat off, making a bundle with it and the blanket, and shoved the two into the waterproof rucksack.

"Take this, and hold it high over your head. I must try to find out the best way for us to get across. You'll have to get your clothes off and put them in the rucksack; when we get to the other side you can wrap yourself in the blanket till you get dried out and can dress again. It's the only way out."

I stood on the brink, then took one of her arms. She put the other around my neck, and lifted the bundle high. I lowered myself into the water. It was a stiff struggle for my tired limbs; the river rushed along tearing me downstream. I swam with my legs and with the free arm, but even then we might have missed had not Lena glided suddenly from my arms, gripped an overhanging liana, and dragged us both to the shore. When we reached the other side I had to lie down to give my overstrained muscles a chance to rest and to get some air into my lungs.

"Take the blanket. Let me know when you're all ready and I can get up again."

I almost went to sleep with exhaustion as I lay there, and my clothes felt clammy on me.

"Now."

I stood up again. Lena was blushing once more; the poor girl was tired and very weak, and we went slowly along the edge of the river to find the path I had cut out. She was barefoot and the grasses hurt her as she walked.

Finally we reached the path and started to follow it. It was on the narrowest of ways that I had cut out, and I had to go ahead. Now that we were actually on it, it seemed to run for miles. The sun was low again, and as we approached the little house, its rays reflected redly from the windows.

"Well, Lena?"

She stood still, mouth half open, as though overwhelmed by the sight.

"My father!"

She screamed the words aloud, and in

spite of the pain of her feet, ran toward the house.

Once more a feeling of pain went through me.

"Is that the house that you saw in your dreams?"

"No, no! But my father! My dear father!"

She burst into the door of the little cabin, took in the aspect of the interior at a single glance, then threw herself down on the seat and cried again.

"My father! My dear father!"

I tried to help her to her feet.

"My father is here! He is somewhere near here. Where is he? I know this little house. He brought it with him, in pieces, on the ship. He—"

She stood up again and looked around.

"No, I am mistaken—I myself don't know—there must be many little houses like this, but how did this one come here?"

"We will try to find out when it gets to be morning. For tonight, let us thank God that it is here. Whoever built it is no longer here, in any case, since all around it the garden is overgrown and there is dust on the veranda. It's an abandoned farm!"

She nodded sadly.

"An abandoned farm."

She looked around again, searching the place with her eyes.

"No, nothing that I know. It's all strange. Nothing."

Then she turned to me and noticed that I was trembling with the chill of my swim and the fatigue of my exertions.

"How selfish I am. You're freezing. You lie down for a while, while I go out for a look around."

She pulled open a drawer. Once more she gave a little cry and once more she was disappointed. She had found an old coat, a pair of trousers, and an ancient work-smock. She shook her head. She had hoped to find some certain sign of her father's presence, and had discovered that there was none.

"Here, put these things on."

She stepped out, while I pulled my damp clothes off and put the old ones on. Then I went out to her. She stood on the veranda, looking out, and I saw that though her eyes glowed, she was sad.

"Dead. Dead."

"No, no, not at all. Who is dead?"

"The farm, the house, and the land—probably the farmer too."

I noticed a trembling in her voice. She was sure that the farmer had been her father.

I put my arm around her.

"Lena, don't be ungrateful. A miracle has saved both our lives. For the moment we are well-cared for; we have a good roof over our heads and we have food. We don't know yet what other riddles this farm conceals, but we will find out in time. Come on, please. Your tears wring my heart."

She gazed at me for a moment, then suddenly flung her arms around my neck.

"My dear friend!"

I felt her body against me—and I loved her. I bent as though to kiss her, but she raised her hand.

"No—please—not now."

I understood. She pulled her wrap closer around her and went into the house. For a little while I remained standing outside. The sun was setting over the tangle of green leaves in a pageant of glory. The birds were singing their evening song and far away I could hear the rushing of the water. A comfortable tiredness, a boundless gratitude to the Providence that had brought us there, enveloped me.

"Come."

Lena was calling me in. She had set her hair in order, and had not been idle with the little kitchen meanwhile. On the stove of the vanished farmer rice and coffee were already boiling, and for the moment, Lena was almost happy.

"I've found a cellar," she said, "and it's just full of preserved fruits and meats. There's beans and mutton on the table."

Then for the first time I noticed that the oven had been busy also, and that something lay on the table.

"Isn't it queer that the farmer left everything in such order when he went away?"

I didn't speak the words aloud, but the thought went hurrying through my head. I hurried out again.

"Where are you going?"

"I'll be back in a moment. You don't need to close the door."

She looked at me questioningly, but I knew what I wanted. I was thinking of the wild animals, and hurried along the path I had cut in the jungle. It had already grown dark and the cactus-stems tore at my hands, but nevertheless I worked at them with a will. When I had finished, the hedge was reconstituted and an animal could hardly get through unless it was a giant, and even such a one would find the way difficult.

● When I returned, Lena had taken care of everything like a perfect housekeeper. That was one of the pleasantest meals of my life—to sit at a real table again and eat good food from porcelain.

Even Lena ate with a good appetite, sharpened by the half-fast we had made for more than a day. And the coffee was excellent.

Then she took my hand.

"Don't be annoyed."

"Lena!"

"No, no—only don't be annoyed with me."

There was something in her tone that I could hardly interpret as other than affection.

Then for a few moments she sat silent.

"Lie down, will you? We can close the door and lock it from the inside. If the house hasn't been disturbed for so long, it's more than likely that it will remain one night more and both of us need sleep very much."

I went to the bolt, and saw Lena stand up, suddenly red again. I understood. Here, as on the bank of the river, the thought had come to her that I was a man, and that I was locking the door on us both for the night. Without the lock she never would have remembered it; in the open forest we were no more than companions.

I went back to her and took her hand.

"Lena, don't you trust me?"

She looked down.

"Well, then!"

I let down the hammocks and she got into one of them, permitting that I pack the blanket around her. Then I sat down in the big leather chair, placing it close by the door and facing it. I must get some rest, but at least I would lie across the door and protect it as much as possible. Outside it had become dead still again. Even the howling of the monkeys came from a considerable distance. There seemed to be none of them on this side of the river—and I remember wondering whether they, too, were afraid of the enchanters.

How lucky we were where we were—a genuine house for protection. Now we had time and provisions to wait and look around, and the superstition of the Indians would protect us from that direction.

I heard Lena breathing gently and quietly. She was asleep. She was protected for the present, at least. And I knew that once she overcame this sorrow about her father—then, I might stand a chance with her. She had thrown her arms around my neck.

I went to sleep at once, and I must have slept with a smile of happiness on my lips.

When I woke to find myself stretched across the chairs, Lena was already up and standing beside me—shaking and with fright in her eyes! Once more I heard the terrible whistling, the insane howling and groaning that we had heard every night since the crash of the plane, with the difference that it was much, much nearer than ever before. Very, very near, right outside, it seemed. The whole earth seemed to tremble with the sound. Then it was still again, but only for a moment, for almost immediately there began, somewhere in the distance, a rumble, a clacking and creaking, and after an in-

terval, a succession of the shocks of dull blows.

"The animal."

Could it be an animal?—or more than one? Once more the earth seemed to tremble beneath a series of heavy, solid blows that came nearer and louder with each passing moment. We had not opened the door, but we stood by the two windows, staring through the wooden grating that covered them. The nightly rain was over, but the clouds still hung low in the sky and the stars were few and weak as we looked out. Lena had put her arm around me, and I held mine around her, as though for protection. In my other hand I held the revolver. Absurd!—a revolver for protection against such a herd of giants as could produce that earth-rending sound!

It kept coming nearer. Now we could see the shadow of something northerly, where during the day we had noticed the broad, regularly cut street through the wilderness; a faint cloud of smoke it seemed in the dimness. We heard a piping and rattle, a sucking sound; then a tearing, the crash of branches and the bursting of lianas and we saw fragments of vegetation thrown into the air. It was still coming down the wide-cut way, with terrific clash and rattle, always accompanied by the sucking sound and the regular, massive blows on the ground.

And then slowly the sounds began to decrease a trifle. The little cloud of dust that stood over it, the continual cloud that was made up of the fragments of torn leaves and branches, moved off gradually to the southward, and the animal, whose long, black arms we had seen vaguely outlined against the sky, slowly passed and went in the other direction.

"What was that?"

"I don't know."

"Some gigantic animal?"

"I never heard of such an animal."

"A herd—"

"We simply can't tell yet, but it's gone by and without doing us any particular damage, and we can be certain that it won't come back till tomorrow night."

"Queer."

"Very queer, but in any case, let me beg you to go back to bed."

She went back to the hammock without answering. She let me tuck her in like a little child.

"I'm so scared!"

It was silent again. Finally I felt a gentle pressure from Lena's hand, and with a soft sigh she went back to sleep.

I looked out. The heavens were beginning to lighten a trifle with the first hint of the coming day. I stared in the direction where the frightful animal had gone. The way through the underbrush where I had seen it yesterday seemed to have become perceptibly broader—broader, but, as it had gone yesterday, it went this morning, perfectly straight as though laid by a ruler, right past our house. If I had not been in the midst of wild Yucatan, in a neighborhod where even this farm had a primitive character, I might have thought that it was some kind of a machine, some kind of a gigantic reaping machine. But that was simple foolishness. What would such a machine be doing on an abandoned farm? Where were the men that cared for it? I stared out into the dark of the coming day for a long time without being able to find the slightest answer to the puzzle, and finally sleep closed my eyelids once more.

CHAPTER IV

A Fantastic Farm

As soon as the sun had mounted far enough so that I could see clearly, I went out. I was determined to at least track down this frightful animal and find where it went or where it had come from. I had brought my glasses with me this time, and even from the distance of the house had been able to make out that the way through the thickets had in fact been considerably widened. What wonderful animals these were, thus to tramp a new path for themselves through the wilderness every day! I need not worry about Lena for the present. She was fast asleep, repairing her faculties after the

exhaustion of the previous day and the sleepless night that had gone before it. I crept out with careful steps, and affixed a balk of wood before the door, certain that she would hardly want to leave, and that in this way she would be protected against the chance arrival of any animal that might wish to get in.

Now once more I began the tiresome task of hewing a path for myself with the aid of the machete. Certainly it was not as heavy a job as it had been the day before, since I could now make out that a pathway had once led down from the door of the house in the direction I wished to go. The cactus hedge had a gap in it, still visible among the tangle of younger vegetation, and going down to it was what had once been a path paved with stones and lined with shrubs, now much overgrown. Naturally the path I made through the jungle was only a narrow one, but three hours had passed and the perspiration was once more pouring from my body when I reached the track that the monster had cut through the growths.

It presented a frightful picture of devastation. Everything was cut and torn down, grasses and shrubs alike wrenched from the ground and strewn along it. The whole ground looked as though it had been painstakingly dug up with shovels. But of definite footprints, of claw-marks or any other traces of the passage of the monster there was not a sign. On the contrary there was something else, even more puzzling. Along the stretch that represented last night's widening of the monster's track, among the torn bushes and chopped-off grasses, lay a fine dust of cinders. Had the lightning struck here during the night? And then again, cut off plants in the heat of the tropics dry out with a speed that is amazing, making them perfect fuel. Or had I, by any chance, touched off the fire that had consumed some of these remains? I had not been able to note this fact before with the aid of the glasses, as the standing vegetation hid it from me. But even among these cinders there was nothing that could give the slightest indication that any known animal or human being had gone by. I was walking thoughtfully along the track the monster had made during the preceding night, when my foot touched against something that had a metallic sound as I kicked it. I bent down, pushed some of the vegetation away, and found myself beholding a chain —a heavy, shining, nickle-plated chain that ran right across the strip of wasted ground!

I stood there, completely at sea. Then it must be a machine and not an animal!—a gigantic machine that cut the vegetation to pieces, that tore the shrubs from the ground and at the same time cut them to pieces, that dug up the ground and made it all smooth again—a machine that sighing, whistling, and steaming, moved along this chain.

Therefore there must be men not far from here! For where there are machines there must be men to work them.

I took my glasses. Endlessly in both directions the path stretched away, endlessly and lonely. Everything was still as death. Only a few birds were singing in the hedges, a few insects chirped or whirred about the blooms of the innumerable flowers. And there was the low melody of the distant river.

I was very much excited. Men! Naturally, they must be Europeans. Would one of them be Wenzel Aporius?

It was almost involuntarily that I pronounced his name even to myself. Wenzel Aporius and his great inventions! His wonderful machines—was this what had become of them?

I drew my revolver from its holster and fired a shot. The sound echoed back from the level walls of the jungle. I looked and listened—no answer; everything was quiet. How heavy that silence seemed, and how incomprehensible! For there must be men somewhere near.

I swept the perspiration back from my forehead, then walked slowly back toward the house. What would I tell Lena?

She was standing at the window when I arrived.

"God be praised that you came back."

I tried to smile.

"Pardon me for locking the door in that unconventional fashion."

She was still looking at me questioningly.

"Did you fire a shot?"

"Nothing. Only a signal. I wanted to call the attention of any men, if there were any around."

I went on in. Lena had got an excellent breakfast ready, and the coffee smelled good. She poured a cup of it for me. I sat myself so that my face was in the dark, and did my drinking and eating in silence. I could see that she was disappointed, and this was not surprising, as I had failed to praise her excellent breakfast.

"What's wrong?"

"Nothing, Lena. I'm only a little tired. Pardon me for sitting here and eating like a barbarian without stopping to thank you."

"You must have run into something that made you uneasy."

I compelled myself to laugh.

"Not at all, but let me beg you—eat something yourself and then let's talk things over."

She looked at me, sighed, and we finished the meal in silence.

"Now, go ahead," she said later.

"Lena, this is important. I wonder—"

She had sprung to her feet.

"For heaven's sake, what's—"

"It is not altogether impossible that your dreams were right."

She gripped my shoulders and looked into my eyes.

"My father?"

"I beg you, try to be calm. I don't really know anything yet. I have not seen a single soul, and my shot remains unanswered. I have not the slightest proof that we are not the only human beings in this part of the country—but—"

"But—"

"The monster that thundered past us during the night, and that we heard on the previous nights also, is a machine."

"A machine?"

"A gigantic machine it is, that drags a chain behind it. That is to say, I have seen nothing but the completed work that it has done and its chain."

"And you imagine—my father—?"

"Nothing. Nothing. But if a machine is working on this piece of ground, men must have built the machine. And this house also, for that matter. And it is probable that they are altogether other folk than Mexican farmers, for all the farms I have seen in Mexico, and I have travelled a good deal in Latin America, have been worked in quite a primitive manner. It is also within the possibilities that your father landed somewhere on the coast of Mexico, that he brought his machines with him and—"

"It is he! It is he!"

● She threw her arms around my neck and shouted for joy. It was so friendly an embrace, one so spontaneous, that I was a little doubtful.

"Lena, I warn you. This is only a deduction, a guess."

"No, it's a certainty."

"And—when we know—"

"Whether he is alive?"

She stared at me.

"Of course the machine will go past tonight, too. How can it go if it doesn't have an operator?"

"Do you feel better than you did yesterday?"

"Oh, I'm all right again."

"I think we will try to riddle out this secret by going directly out to meet the machine."

"Great!"

She would have hastened out barefooted to the track of the machine, but I rummaged around till I found a pair of old sandals for her. Then we packed the rucksack carefully with plenty of food, went back to the river and filled the waterflasks, and set the house in order before leaving.

During all these preparations it had reached afternoon, and the sun was already on its downward path. We went along the narrow way I had cut through that morning, and were soon at the great

street through the wilderness, but as we reached it, we recoiled. A cloud of smoke rose in the north and seemed to be hurrying toward us with terrifying rapidity.

"Fire!"

I hurried Lena back to the house, and with the suddenness of the race-horse, the rolling cloud of smoke came down upon us. For some little time the air was filled with heavy smoke and drifting sparks. It became difficult to breath; the air seemed to press on our lungs, and then with the same rapidity that it had come, the fire rushed past us away and along the path the machine had taken. It must certainly have been kindled by some human hand among the dried plants back at the beginning of the machine's path, gained gradually among the dry herbiage during the heat of the morning and come storming down the track in the afternoon. Naturally the vegetation at either side was too wet to burn; it simply ate its way along the path the machine had followed, leaving perfectly cleared land gently strewn with cinders, that could be seeded in a day or two and grow whatever crop one desired to put in it.

We waited for a few minutes after the fire had passed, and then went out again.

"Which direction shall we take?"

"Towards the south, I think. We want to find the machine. It seems certain that it can't be very far away, and when we find it, we will certainly meet someone."

It was very curious that the gigantic plow only came past once every twenty-four hours. For today at least we had neither seen nor heard it a second time, and even now it seemed all still and there was no sound of its activity.

We walked slowly down the track. If it had not been for the heat of the tropical sun, which beat down on our unprotected heads without mercy, it would have been a pleasant stroll along the wide, even street that the machine had made. I kept my eye on the chain. It seemed endless, reaching away before us, heavy and glistening.

It must be drawn up when the machine passed along again. But how incredible this complete silence was, this utter lack of activity in the wilderness, in the middle of which lay the iron chain as the only sign of the presence of man.

The terrain was almost flat, with only slight swells and rises. And we finally saw the machine itself standing there. Huge, gigantic, incredible. Like a monster with immense arms it stood before us—a huge iron prow, behind which reached out a wilderness of arms bearing razor-sharp knives and cutters, and behind them again, all lined up, plow after plow. A gigantic reaping apparatus was behind the whole; there was an inclined, twisting plane, and in the center of the whole, arms that bore a monstrous spool.

The colossus lay silent now. Near by was another little house, much like the one in which we had slept, but simpler of construction and smaller. No one seemed to be anywhere near. I shouted—there was no answer. I shot my revolver again—still no result; no man, high or low.

Lena was all eyes for the machine.

"This is the work of my father. I know the model; I have seen the plans for it among his papers."

"Then he must be here also, or someone who knows about him."

I took time to observe the machine myself. It seemed uncared for. There were great red spots of rust on the arms, and up above on the little tower which surmounted the swinging bridge that ran across the huge machine, dust had collected and a little plant grew.

In the last rays of the evening sun the monster looked fantastic, dreamlike, like something that did not belong in this land and was aware of its lack of welcome and prepared to defy it.

"What next?"

Lena stared at me.

"I think we ought to stay here for tonight. Who knows where the men who take care of this machine are? We would be too late to catch them if we went back to the house where we were last night. If the machine has followed approximately the same path in the last two nights it seems likely that it will turn and go back tonight. There must be some rule that it

shall work only at night and just after the rain has fallen. Perhaps it is easier for the machine to break up the ground at that time. I imagine that the engineers who run the thing are probably sleeping in a wood or by the bank of a river somewhere about now."

● The thought that the earth was probably ploughed only just after it had been softened by the nightly rain had the effect of calming me to some extent. We went over to the little house. It had wooden window-gratings like that back on the hill, and stood in the center of a little place of its own, stony and hence free from the tangling vegetation that was everywhere else. I knocked at the door. It was possible that someone was asleep within.

"No, that can't be. Look, it has been locked from the outside. How could anyone be inside?"

We opened the door. It was a cool, empty room. There was no furniture but a table and a bench, none of the little comforts of the other house we had left.

"It's been a long time since anyone was here. Do you notice how thick the dust is over everything?"

It was almost uncanny—these machines that worked so busily every night, and yet these houses that seemed to have been empty for weeks or months.

Outside, the twilight had come and the night followed fast. We made a fire on the hearth, cooked up some coffee and ate provisions from the store we had brought with us. There was no cause for disappointment that hammocks were lacking from this house, for neither of us felt like sleeping. Ever and again I would go out into the still night to watch the machine. Had the men come yet? Was anyone coming to take care of the giant machine?—or had last night's effort really been its swan-song, and had the crew gone elsewhere afterward?

"We will wait till morning at least, and if no one comes, then as soon as the sun rises, start out while the morning is still cool and follow the chain back. That will lead us to the garage where the machine was stored, and probably to the headquarters of the farm."

Lena sat thoughtfully, looking straight before her. Finally she spoke sadly.

"Poor father! I wonder if you know that your daughter is here?"

I said nothing. What could I have said?

Oh, this eternal silence! Once again, all around in the far distance, there was the old concert of night in the jungle, but close around us the most absolute stillness. Punctual to the minute, the nightly rain began. With watch in hand, we counted the minutes. And after it seemed that the hour would never end, it did end at last. Hand in hand we stood at the open door of the little house, watching the lightning as it flickered away along the horizon. Dumb, without life or director, the colossal machine stood against the night.

And then—just as yesterday, the shrill whistling. Tonight we heard it without fear, and noted with certainty that it came from the north and sounded farther away than before. Then silence again. And now? And now, right near us, where the machine stood, there came a clatter and clang of metal.

"Look! Look!"

It was still dark, broken only by a few flashes of lightning, a far-away lightning. My revolver was out and in my hand. There was no assurance that the men on whom we burst so suddenly might not take us for enemies. The clattering within the machine became louder. We saw now how the colossus began to swing and —to move by itself!—not straight ahead, but rather sidewards. We ran and shouted. Everything was silent but the clatter and clang of the machine. Not a soul was to be seen.

Now the machine had stopped and everything was still once more. Nobody was near! I called, I banged against the sides of the iron giant. Nobody! Complete quiet, and then once more a beginning of motion. The machine seemed to gather strength with a clicking of gears and then—

With a cry, I flung Lena away from the path of the machine, and we tumbled together to the ground, where we looked up to see life come to the arms of the monster. The bridge on top swung around; the metallic arms circled around like the sails of a windmill. There was a terrific creaking and groaning from badly cared-for metal parts, then the digging instruments stuck their snouts into the ground. Moist earth spouted forth, chewed-up bits of vegetation leaped through the air and struck us in the face. The great spool swung slowly around and began to wind up the chain. Groaning, screaming, clattering, and ringing the machine turned its back on us and began to go in the direction from which it had come. In the fast disappearing light of the lightning-flashes we saw the giant swinging its great arms and mowing a new path through the vegetation, a widening of the old. We were upright again and mechanically brushing from us the fragments of plants and dirt that had fallen upon us. Then only did I have intelligence enough to look at the ground. While one chain-cable ran from north to south, another lay there from east to west. The second chain seemed to be anchored fast and it was by its means, evidently, that the machine had moved sidewise before turning back. The north-south chain was trembling with motion as it ran across the spool and back to the earth again.

"That is my father's work," Lena declared, her voice trembling.

She pointed northward.

He must be in that direction. The machines must be serviced from some central station there.

Something strange was going on inside of me. I was now as fully determined as she that Wenzel Aporius was here, or at least had been here, and had built these wonderful machines, but I was almost as much convinced that he was dead—dead, or no longer here for some reason. Such a man as Wenzel Aporius could never bear that his machines should become rusty and develop patches of green growth on them.

● We turned back once more to the little house, Lena so excited that she did not seem to mind the fact that we had not slept all night.

"Why didn't we get into the machine and ride back with it?"

We could very well have done it, for that matter. But it was too late now, so we made a hasty and very early breakfast, and once more took up our march out into the morning, Lena filled with glad certainty, myself with sorrow and care.

At noon we laid over in the house to which we had first come, and punctually at the same hour the river of fire flowed along the cutting and destroyed the dried vegetation the great machine had cut. After it had passed, we started out once more. I had made up my mind, without any very reasonable basis, that we were somewhere in the middle of the district assigned to this machine, and as it turned out, I was perfectly right. Only this time we went along much faster, although the way led uphill all along, toward the mountains. I looked at Lena from time to time. Her eyes were filled with tears of happy expectation, and she breathed fast and excitedly. In spite of this, our march began to slow down a little. A walk in the open in the tropics, even when the ground is level, has always the obstacle of the sun to overcome. My head burned and, although we had spent the worst hours in the little house and even now halted frequently for rest, I felt that my limbs were as weary and sad as my thoughts. I began to grow exhausted, to forget Wenzel Aporius and think only of shade, shade, and where I could be cool for a moment. Before my wearied eyes I began to see oases with waving palm trees, swimming in the glowing heat. Beside me, even Lena was beginning to give out, which was not surprising, in view of the fact that she was nowhere nearly as strong as I. She had slept no more than I the night before, and all day had walked across hill and dale by my side. Only the thought of her father, her belief in him, kept her going, gave her strength to place one foot mechanically before the other, and to press

on, with her eyes fixed on the distance.

And finally came a sound that gave us new life—a light humming, singing sound that seemed to fill the air, the murmur of numerous machines. The farm! Men!

Then once more came the sound of a shock and suddenly the humming sounds ceased. The watch pointed to exactly six o'clock.

"They have stopped for the day."

And now it was not long before our eyes met a new picture—a line of tall rocks, they seemed. They were not very high, perhaps thirty or forty feet, but they pushed right up out of the level meadows and, seen against that background, were taller than their real height. I swung down the glasses from my shoulder and peered at them.

"Lena, the farm!"

I handed the glasses over to her. Quite clearly, we could make out along the lower edge of the cliffs a number of buildings —buildings that had certainly been erected by the head of man. Whether they were dwellings or not we could not be certain from this distance, but there seemed to be a number of wires and cables running together at the houses. And now we heard a sound again—the rustle of a waterfall mingled with the humming of wheels.

We forgot our weariness and strode forward eagerly.

"A light!"

It was Lena who shouted it. And as a matter of fact, there was a light, an electric light fixed at the top of a tall mast, and as we looked, we saw it was not one but many—a whole line of lights that seemed to define the outline of a regular street.

We hurried nearer, breaking into a run. And as we approached, we discovered that the rocks we had seen were not isolated monoliths but the outcropping of a high plateau. But remarkably, the river—we could not tell whether it was the same river we had crossed two days before—the river, I said, did not wash around the foot of these rocks, but came right down over them. A tall and beautiful waterfall threw its veil of mist over the teeth of the rocks. Out in front of the rocks was a tall building covered with stucco, its interior lighted up. The murmur of wheels came from it. Out in front of it again was a mass of gigantic scaffoldings, colossal balance wheels, gears and cables, mounting clear to the top of the rocky plateau, and apparently anchored to it.

It was either a huge factory or a monster power station.

Involuntarily we had halted at the sight. There seemed no human being within sight or hearing. And then I noticed something that both astonished and frightened me.

In front of the houses, along the street, between the legs and wheels of the machines—everywhere, there was tall grass, and other growing tropical plants shoving their way among the metallic parts of the machines. And the street itself, which had been paved, was also covered with a faint hint of green that had never been trodden down.

We stood before the first building and looked at each other. I said nothing but I felt that Lena was thinking the same thoughts that I was.

"Hello!"

I called loudly—but no one answered.

• We mounted the steps up to the machine house. Before the door a hibiscus plant stood, in full bloom, and I had to cut it off before we could get in. Apparently this was a door that was not much used, but our growing impatience did not give us time to look for any other. The door proved to be unlocked.

Opening it, we found ourselves in a wide hall, apparently a grotto originally, which had been widened out, then beamed and windowed with glass and steel. We were standing on a bridge, or kind of mezzanine, looking down on the place.

Two gigantic machines with huge balance-wheels were at work below us. The rushing sound of water assured us that they were driven by the water-fall. The room was brilliant with the glow of strong, clear electric lights. From every direction along the walls we heard a regular, but

determined clicking, like that of monstrous clocks. Over the machines on spidery arms, rose oiling devices from which a steady flow of oil dropped into the working parts. We stared at the machines; we shouted—no answer. There was no one here. And the most incredible fact of all was the discovery that the room had no other outlet, no door but that through which we had come, and that door had been cut off by a fully grown hibiscus which had reached the stage of blossom.

I wondered whether Lena had noticed it.

We went out again, silently. Even now there was no sign of a living being, not even an animal. Such a farm would certainly need animals.

What a shame that it was already becoming too dark to see!

Wordlessly we walked along the lighted street. Along both sides were big warehouses, among them a big building of corrugated iron, a tower that looked like a grain elevator and around it tall stacks of threshed grain straw; and further along stacks of straw were all bound up into bales. The first ranks of these baled stacks were evenly arranged; further along they were piled up in wild disorder as though a storm had spoiled the arrangement.

The queer thing was that it was all the work of men, but not a single man was to be seen.

Some of the lamps were out, as though they had gone out by themselves and had not been replaced.

Everywhere, as far as we could make out in the dimness, were more and more machines, flywheels, corrugated iron buildings, and a whole network of wires.

And then suddenly we were at the end of the lighted street and the darkness was all around us—no human being, no human dwelling, no animals. Out here the rush of the waterfall and the working of the powerhouse were inaudible, and we were in the silence of the wilderness.

"Where are they?"

Lena put the question with a voice full of anxiety.

"I don't know. I think that we have come a couple of hours too late. You noticed how the wheels stopped turning while we were on the way. Probably all these wheels that we saw were working. It's probably a holiday evening and the whole crew that man's this farm is off somewhere along the bank of a river, taking a rest."

I was saying things that I did not believe myself.

"But not a man around? Not even a watchman?"

Why wasn't there a watchman? The Indians were afraid of the machines as the work of enchanters. We ourselves had taken the harmless gang-plow for some mighty animal, for that matter.

"What shall we do now?"

"It's very simple. We know that there are men around here. It seems likely that your father is among them. In fact, it's more than likely; no ordinary farmer would build machines like this in the middle of the wilderness. We can see the marks of his handiwork everywhere. We must be patient at least until tomorrow morning. Please, Lena! It was only yesterday that we were sure your dreams didn't have even a kernel of truth in them; today we have attained the certainty either of finding your father or hearing of him, and discovering where we can find him. A few hours more can't really matter. We can go back to the machine house and find a place to spend the night, then early in the morning—"

Lena made an obvious effort to control herself.

"You're right — only I'm so anxious."

She had suddenly grown tired and leaned against me.

"Sit down here and wait while I try to find a place to stay. Or will you be frightened?"

She smiled.

"Afraid? Why, I'm on my own father's farm. Go ahead."

Near the big powerhouse where the electrical works were, I had noted another of the little houses, very much like that we had stayed in out by the cables the

night before. I hurried to it and knocked at the door. Nobody answered, but I found the door unlocked when I tried it. I opened it—inside all was dark. I called out, still hoping that perhaps I might awaken some sleeper. There was no answer; I lit a match and in the feeble illumination caught sight of a switch at the wall. The bright light flamed forth and I paused to look around me. It was a room, not unlike the others we had been in. There was a big table, a broad leather seat, a small electric cook-stove, and a cabinet with dishes and cans and jars of food. A door at the back apparently led into another room, and on being opened revealed a simple bed with a soft woolen coverlet. Otherwise the place was empty.

A trap-door led to a cool cellar, apparently cooled by some artificial means, since the temperature was far below what one would expect. Here also were rows of canned and preserved foods.

● The man who had lived here had apparently abandoned everything, and might have abandoned them the day before but for the indication furnished by the thick coating of dust over everything. It was so thick on floor and furniture that every footstep left a perceptible mark.

On the wall hung a basin; I filled it with water and hastily wiped off table, chairs, and cabinet, then shook out the bed, to keep Lena from observing that nobody had been here for some time.

Then I hurried back to where I had left her. She still sat on a bale of straw, where she had first rested herself, but her head had sunk over to one side and she was already fast asleep, her lips curled by a little smile of happiness.

When I woke her she stared about wonderingly at first.

"Come along, Lena; I've found a place for us to spend the night."

She sighed, but she took my arm without saying anything and came with me. I had left the light on in the little house.

"Can we go in here all right?"

She looked around at the place with an air of astonishment. Now that the universal coating of dust had been removed and the water was beginning to boil on the little electric stove where I had set it, the place truly gave the impression that the owner had just stepped out a moment before.

"Does somebody live here?"

"In any case, the owner of the building is not here now, and we can hardly expect him to come so late. The bedroom there is empty and if he should come, I'm sure he will prove gentleman enough to let a tired woman occupy his bed for tonight and not think anything of the fact that I'm sitting up in another room. We're lucky tonight, Miss Lena. Electrical light and cooking! —and a good bed for you, not to mention the fact of having a room all to yourself. And look here—here's a good supper with cocoa to drink. I didn't put on the coffee because I think we both need some sleep."

I had spoken loudly and rapidly to keep her attention, and by the same device managed to get her to eat a bite or two and drink a little cocoa.

"Now go to bed and get plenty of sleep. Dream well until tomorrow morning."

I lit the light in the bedroom. Lena was half-drunk with sleep; her exhaustion had all returned when there was no longer the excitement to sustain it. She permitted me to tuck the blanket around her, and then was asleep at once. I stepped out cautiously, put out the light, and closed the door behind her.

My own weariness had vanished. I opened the desk, being certain that there would be no one to interrupt me this night.

There was nothing in it but a day-book, its pages covered with a fine handwriting —a work-book of some kind, with information like this:

"July 10—Ten sacks of grain threshed out. New coffee plants set—"

There was a list of daily work done, extending over almost a whole year, but there was nothing in it to show to whom the book had belonged. The new book, filled up after this one was completed probably held the information I sought, but it

was not there. On the other hand, the binding of the book was lettered faintly in gold:

"Screw steamer Prinz Christian."

That furnished the final certainty; this was unquestionably the farm of the great Wenzel Aporius. I sat down on the leather sofa, bolted the door, and left the light burning. I did not wish to be surprised if someone came.

In a few moments my eyes also had fallen closed, but it was only a kind of unquiet doze into which I sank and not true sleep. In spite of my exhaustion, the puzzle of what all these things meant kept me awake as I went over again and again what we had seen. Over and over I remembered how I had sprung up the steps of the powerhouse, how we had seen the brightly burning lamps, the smoothly-working machinery, the oiling devices dripping into the vitals of the machines—and nowhere any sign of human occupancy or any trace that a human being had been there for months.

I got up and went out; everything remained as I had last seen it. As I was coming back, I was surprised by the onrush of the nightly rain. Thanks to the light of the lamps, I had not noted how the sky had clouded over, and now it came down on me in great streams and I heard it tap on the metal parts of the machines and the corrugated iron of the buildings. My nerves were tingling—one hour more and the terrible shrieking of whistles would begin—and with them the machines would go to work, the men who manned them would come.

I held my watch in my hand. Exactly on the tick of the hour came the terrifying whistle and shriek, echoed back from the rocks in a thousand howls and weird groans.

● Wonderful! The sound that had so terrified me out there in the jungle now seemed something natural, although it was much louder here than there. The difference lay in this—that I knew it for the siren of this great factory, calling the workers to their tasks. The obviousness of the thing took all the frightfulness out of it. I went to have a glance at Lena. She was sleeping and smiling in her sleep. Doubtless she had heard the cry of the siren in her dreams. I went out and looked around, seeking for some sight of the men who would be coming to begin their daily tasks. Up on the cliffs above I heard a dull shock and clang as though metal were striking on metal, and at the same moment a frightful racket began. It was a creaking, whirring, and whistling. The first light began to appear along the horizon and the electric lights went out abruptly. But in the grey of the dawn I could make out that everywhere around me wheels were whirring, sliding parts were moving smoothly to and fro, great arms swinging back and forth, hammers banging. In front of me everything seemed alive; the huge plow, which had been standing near by the house without my having observed it in the night, seemed to shake itself, turn around, swung its arms, creaked—and began to move back southward whence it and we had come, tearing up the vegetation, ploughing the ground beneath the wrenched-out plants and shrubs.

I stood for a moment with trembling limbs, gazing at it. All around me were machines, busily at work, machines that threshed and winnowed grain, that threw straw into the air, that gathered it up again and wrought it into bundles, that dug, chopped, ground. A gigantic picture it was—a frightening, an incredible picture; machines and machines and no man to control or watch them!

Machines that seemingly with full consciousness walked out into the fields to do their daily work. And even now there was no living being among them save myself. I put my hands to my head; I pinched myself to see whether I were awake. Was it all some fantastic dream? Had these machines in some incredible fashion been provided with brains? Had they revolted against the men who built them, slain those men and then set themselves up to rule in this insane country of machinery?

Or was I insane? I had heard of automatic machinery; but automatic machinery

on this scale, without anyone to watch it, never.

I was standing on the spot where the great ploughing machine had slept. It was absurd—slept! How could a machine sleep and wake by itself?

A drop of something fell in my hand. I looked up and around, and discovered that the drop was of fine oil. It must have dropped like that all night into the big gang-plow, for I saw now that the machine was no longer there, the oil was falling into a funnel and being carried away somewhere underground.

I went back to the house. Lena was up; she looked at me with big, frightened eyes, surprised and questioning.

"My father's work!"

I did not answer.

"Did you speak to anyone? Where is my father?"

I could no longer keep silent.

"It is incredible, but there is not a man to be seen."

"What?"

"No one."

"We must have overslept!"

"No, Lena, I was awake all night. No one, I tell you! And all of a sudden the wheels began to turn and do everything by themselves. No one! I was in the power-house, Lena; I went all along the street. No one. Only the machines, which are working all by themselves."

I was surprised by the way she took it. She was not frightened, but rather overjoyed.

"My father's dream!—the complete utilization of mechanical power. It's the working out of a model he himself built. A single pressure on a button, and the work of a whole factory begins without anyone to watch or guide it. Now I'm certain that my father made all this."

"Yes."

"And you know, too?"

"I found a book that was lettered with 'Prinz Christian'."

She laughed.

"What of it? Doesn't everything around us here bear the stamp of his hand? My poor friend, you're pale, and yet it is all so simple. Come on, everything is all right. Now let's have our breakfast and then go look for my father. Somewhere around here he's sitting in his office and being waited upon by iron servants. He's alive, I know it now, and I want to find him."

● She was tremulous with delight, and I with fear. Not all of the machines were running; I had seen that. Among them lay some buildings of corrugated iron with their walls burst out. I had seen huge arms rearing ghostly against the heavens—and along the street the grass was growing. I had seen how the elevator was overflowing and had seen a threshing floor where arms danced a wild and fearful dance on a platform of concrete that had long since been beaten to powder, and where there was no grain to thresh.

I followed Lena silently into the house. She was quite quiet and confident now.

"Now I'm really hungry and thirsty. Let's have some of the coffee that father sowed and reaped and a breakfast of the foods that my father has prepared."

She went into the cellar and produced a jar that contained good solid butter and a glass of preserved eggs, and in a few minutes was getting a breakfast ready.

"We must breakfast well, and then try to fix up our clothes a little. I don't want my father to be frightened at the sight of us. My goodness, how bad my clothes look!"

She was altogether changed and I did not attempt to dampen her ardors. I had the sorrowful conviction that this day would bring us boundless pain, but I was exhausted and willing to let Lena have her hour of joy. For the present it was enough for me to sit there and listen to Lena's voice and to forget the senseless clatter of the machines outside. One did not need to be an Indian to be a little afraid of these metallic giants.

With an effort I tried to be happy and make jokes.

"And what will you do when the man to whom this house belongs comes around?"

I knew he would not come, and that he was more likely dead than alive. She laughed.

"Let him come. Is he not one of my father's helpers? I'm at home."

We ate and drank, and then Lena went into her room. I heard her singing as she made her toilet. For the first time in my life I heard Lena Aporius singing with happiness. It was a happy little song of childhood. Perhaps, even, it was a song she had learned from her father.

I also made some effort to clean up; I shaved myself, tried to brush off my dirty clothes, and combed my hair.

"Are you ready?"

"I think so."

She laughed and opened the door to present herself to me.

"Splendid!"

We both laughed and then opened the door. Once again the fantastic appearance of all those working machines beat upon my intelligence. The wheels turned, the gears spun and meshed. The grain flowed from the discharge-tube of the elevator. Gigantic arms gripped straw, whirled it into bundles and threw the bundles onto the pile. Slowly and heavily other machines were moving across the fields. Harrows tossed earth up under their teeth; gripping hands thrust plants into the winnowed ground—or tried to, for there were no plants for them to set out. Other machines moved about more rapidly, spraying fine water, like rain on the ground.

It was wonderful work—and the most wonderful of all, it was done by the machines alone. And then came a thunder, a vast cracking and breaking. Huge fragments of iron leaped into the sky, and then one of the metallic colossi collapsed with a crashing of its members. But before I had time to observe the accident, a second colossus had crossed the field toward the first. It was some hundred yards or more from us; one might almost think it moved by means of some actuating intelligence. It halted by the side of the broken machine for a moment, standing there with a clicking of gears. Then it bent—my God, it actually bent, over the smashed brother-machine, hoisted it up, gripped it with a hundred arms of iron, and then turned and, with all its metal parts clanking and ringing, went on its way.

I had the sensation that my intelligence was standing still. The machine had a brain! It had done something that seemed impossible to a mere creature of metal and electricity. One machine knew about the other's accident. They thought!

Lena laughed slightly and spoke quite calmly.

"That might well have been a bad accident there. Father has evidently designed monitor machines to take broken ones out of the way. It would have been a bad business if another machine had come along and charged into that wreck. Probably the smashing of the first caused a short-circuit of some kind and threw in a message for the machine that pulled the broken one out of the way."

I breathed again. Naturally her explanation covered the case. The two machines were on the same circuit; a moment more and one of them would have run into the other. When the first one stood still, however, some contact must have been closed or broken, and the emergency machine swung into action. And when the first machine had been pulled out of the way, it would be simply the matter of another contact and everything was normal again.

I laughed at myself.

"Which direction shall we take?"

At first we walked along the great street, but it only led us out into the fields. They stretched away before our view, endless and regular, covered with plants. There were coffee-plants covered with ripe fruit, and we climbed a little tower that seemed to have been erected there for the purpose, to look them over.

Once more there was something curious. As we laid our hands on the rail of the tower, it began to turn very slowly and gently so that without moving, we were able to look all around the horizon. In every direction we saw the same thing—fruitful plantations, carefully laid out, the plants in even rows. Among the coffee

plants nearest us we saw something moving about.

"There are men there!"

I picked up the glasses.

Not men—machines, little machines, that went from plant to plant, apparently on caterpillar tracks, cutting off the ripe fruit. We could not make out what they did with them after plucking. Far to the eastward beyond the big machine-house where we had spent the night was a thick forest. We saw that a network of wires ran into it and disappeared among the foliage.

"We will probably find the dwelling houses over there."

So we went back across the fields, back past the machines that went on with their work, oblivious of our presence.

Where did the arms get the straw that they were baling up so carefully?

It came flowing out of a tower-like building, down a chute which delivered it to the gripping arms. I noticed that a cable went in through the top of the chute. Iron arms reached down from above, gathered up piles of unbaled straw and shoved it against the chute. Further back I saw that other arms were gathering huge bundles of unthreshed grain, which they delivered to a huge threshing machine, and it was from this that the straw supply was maintained. The grain came out of another chute at the base of the tower.

As we passed the machine-house once more, my eye caught the glint of something bright on the cliffs above. It was a lens into which the rays of the rising sun fell. Behind it was a plume of steam. The steam became thicker, then a spark flashed out, and quick as light, I saw a flash of flame run along the dried grass and shrubs that the big ploughing machine had cut off during the previous night. A ventilator began to puff and sent the flame rushing along the track of the giant machine.

● The sun must fall through that burning glass daily in the same fashion. Daily at the same hour the pennon of fire must run across the fields, consuming the dry weeds and grasses, while the giant plough turned automatically to a new stretch of ground.

We stood there looking at it in astonishment, and then went on once more. In the machine-house everything was as we had left it the previous evening. The wheels turned softly and the waterfall delivered its daily cargo of electrical power.

We went into a little grove. Here also everything was as silent as the grave. Here also there was no living being. But there was a carefully planned and laid out walk, protected against the encroachment of the vegetation with concrete.

On both sides were lattices of iron, accompanied by perches and little birdhouses for parrots.

We stood still. There were some parrots there—but they were dead and dried mummies of parrots. There was something grim and uncanny about the sight of those corpses of birds.

Lena shivered slightly. For the first time she was sensing something of the fear, of the horror that enveloped me.

Before us lay a house. It was a considerable building, long and low, with gabled ends, built of fine woods and carefully painted. A long veranda went around its front; a rustic table and a couple of leather-seated chairs. I reached out to touch one, but as I did so, the leather crumbled like dust in my hand.

Dead!—ruined by the daily heat. How long would it take to produce that effect on a fine leather chair? We opened the door.

"Father!"

She called loud and high and her voice was dully echoed back from the rooms within. No answer.

We entered a little sitting room that seemed the room of an educated man. It contained a writing table, bookcases filled with books, an electric student-lamp, and a telephone, everything in fact that a European villa might have. There was a big table with newspapers spread upon it, and the chair was pushed back a little from the table as though someone had only just got up, but a thick coating of dust covered everything.

Lena screamed aloud and threw her-

self down in the chair. She laid her hands on the table, and almost wrenched from it a framed photograph—her own photograph, a picture of Lena Aporius as a young girl.

"Where—where is he?"

She sprang to her feet and spread out her arms. We hurried through the house—empty, all empty. The sleeping room had an unused bed; in the great dining room was a cup on the table and near it some metallic apparatus rested on the floor. No, it was a metal figure. A man in metal, it was, with iron arms and legs and a funny little head. He lay on the ground and one of his eyes seemed to be winking at us.

"No! No!"

Lena ran out onto the veranda.

"Father! Father!"

She shrieked the words. Outside somewhere there came a long, high whistling, and the whirring of gears and wheels ceased, while at the same moment electric lights blazed out in the house and park.

The invisible spirit of the machine had declared another holiday. A feeling of horror crept over both of us. That great house was so beautifully lit, and everywhere dust and mold, not even a sign of a living being.

Lena turned to me.

"Where is my father?"

"I don't know; I don't know."

I led her back into the workroom and looked around. Under the work table I saw a little drawer, pulled open a little so that a big, thick book was visible within. I brushed the dust from it and saw that the pages were covered with handwriting. On the cover was more writing, tall staggering characters. The ink was pale, but I managed to make out:

"I'm going. Prinz will kill me yet. Revolution! I had to fight with Sennor yesterday. He wants to be master here. How stupid! Men, men. I'm going crazy! Lena—Lena. . . ."

The words stopped here, the last few letters scarcely legible.

"Lena, try to pull yourself together. Is this your father's handwriting?"

She took one look at it, and then cried out.

"Father! My poor, poor father!"

She wept convulsively, and then sank into my arms. Lena Aporius had fainted. I laid her down gently on the divan, and then taking up the book, opened it to the first page, where stood written in clear, even lines, "My day-book. Wenzel Aporius."

Outside it was growing dark, dark and still. Alone in the brightly lighted house, whose lights I did not even know how to turn off, for there seemed no switches, I opened the book and read the words of what could only be a dead man.

CHAPTER V

The Day-Book

August 4, 1914

● Stormy weather. And not in nature alone. Since the declaration of war by Germany against France and Russia, we have almost had a mutiny on the ship. The young men all want to go back to Havana and take the quickest way back home. As though it were at all possible! The French cruiser that has been following us is now between us and the land. If they get us, our machines would be worth while having, for them! God be thanked, it is foggy! We are headed for the coast of Yucatan at full speed. In the afternoon we get another intercepted radio message. England has declared war on Germany; or has she? Suddenly the fog vanishes. Close ahead of us, northwestward, an English warship is visible. No, it's the Frenchman again. Full speed away! Straightaway toward the Yucatan coast. We'll soon be in Mexican territorial waters—but I wonder whether the enemy will care about that? An east storm is coming up, with a high sea. The Frenchman is approaching and has fired a warning shot. I had a talk with Captain Westphal, and we decided that if we halted, the ship would certainly be sunk. Millions of dollars' worth would be lost, not only for Germans, but also for the Americans who

have taken stock in my enterprises and invested in them. Westphal was with me in the matter, and determined to put her on the coast rather than give up. About eleven there came a shock, and we found ourselves in fact on the coast, among uncharted sands. There is a heavy surf inshore from us, and there is a fierce storm with bad weather. The waves occasionally break across the decks, but without damage. At least we are near the land and have that much safety, for the land is neutral.

August 5

The weather cleared up this morning. The ship suffered a good deal during the night. She lay on her side, or almost, with the waves washing over her. The enemy ships seem to be gone. They did not dare come so close on this bad coast, merely to shoot up one small German merchant vessel. All the ship's anchors were put out to hold her from drifting and further damage, as much as possible. Everybody worked like mad, and naturally there was little sleep last night. At least we can say now that our position is better than if we were at the bottom of the sea with all the machines. I certainly should never have left the ship; those machines represent the labors of a lifetime.

Now at least my poor little Lena will get her father back again. This morning I went to land with Captain Westphal, the second and third officers, three of the engineers, and Dr. Hellmuth.

Where we are, we do not quite know —in any case, on a completely lonely and probably uninhabited coast. We found a steppe country with frequent cactus plants, agaves, and sisal with tall bayonets. We clambered up a low hill and saw nothing but a waste—no human being, no sign of any farm visible. Captain Westphal has brought some of the charts, and we made out that we were somewhere about the twenty-first degree, on the mainland, not far from Cazumal Island.

That made it quite clear why the warships did not follow us in, even if they were willing to brave the complications of chasing us into Mexican territorial waters. This coast is mostly uncharted, filled with bad and shifting shoals, and no ship ever comes here. It is the wildest portion of Yucatan. Certainly there are no farms of any kind for miles in any direction. The coast is low-lying, marshy, and full of fevers. We must see whether we can get through to Valladolid. My poor machines! My lifework! What a miserable end for them. Perhaps it would have been better if the French cruiser had caught us after all. How in the world will we ever be able to get away from here? If I could only take the model and plans with me—but on foot to Valladolid!

August 6

We have set up a camp on shore, on as high ground as we could reach. We cannot possibly all get out of this mess together by the overland route, and it has been decided to send out an exploration party. While they are on the way, the crew will land as much as possible of the ship's cargo. If a heavy storm or series of storms come up, the *Prinz Christian* will certainly go to pieces, and if that happens, we will lose a good deal of value.

August 7

We started out on a tour of exploration today, Captain Westphal, Dr. Hellmuth, Chief Engineer Janke, and myself, with four sailors, weapons, a couple of light tents, and provisions. This is a curious stretch of country, a wilderness, and yet somehow frightening apart from the fact that it is semi-desert. Only along the coast is there any forestation, and that is impenetrable jungle. In the interior there is only a carpeting of tufted desert-grass. One discovery—traces of an ancient Indian culture, perhaps. Wonderful coffee-plants, filled with ripe fruit. Tea-shrubs, tobacco, cotton, vanilla, indigo, and even a small sugar-cane swamp, all of them in a more or less wild state. Certainly these plants must

have been cultivated before the bloodlust of the Spanish conquistadors exterminated the Indians to whom they belonged. We camped at the edge of a stream in the shade of lordly amba trees and a type of southern oak whose wood is hard as iron. It would be easy to set up buildings here.

August 8

We met an Indian. He was a stupid fellow who himself did not know what tribe he belonged to, but he spoke a few words of Spanish. It would take weeks for us to get to Valladolid, he says. Not on account of the distance, but because of the difficulties of the journey. A day's journey from here, he tells us, a wild river flows out of a range of impassable mountains. Behind it all is stony desert. No farms, no settlements are anywhere near. There are no tribes in the wilderness except occasional visitors from the Chan Santa Cruz who laid most of Valladolid waste not so long ago. I spent a sleepless night, with a thousand scraps of plans whirling around in my head. If—if—

August 9

I got up very early, woke the captain, and held a long conference with him. What good would it do us to get to Valladolid? At the most we could only go on to Merida or Campeche and from there to Mexico City, where we would be interned. And while we were doing it, millions of dollars' worth of machinery would rust away on the shore. Not millions merely, but much more in ideas. I know what my machines can do. I want to show the world how to cultivate the tropics—machine-work instead of hand-work! That was the whole purpose of this journey to the San Francisco Exposition. And why—to lay my ideas before the Americans? To gain the fame of a great inventor? Honestly, for none of these reasons. Merely to get hold of a piece of land as an experimental farm. And if we go to Valladolid, the machines will be lost and we interned. All that effort will be clean wasted. I never believed that war would come upon us suddenly like this. The whole world is afire! England, France, Germany, Russia, and Austria!

It may last for years, and our little crew cannot be of the slightest use. We should simply rot away here in this neutral country without being of any service to the fatherland.

But here? Is this not just what I have been looking for—a place for an experimental farm? We have all the machines on board, all the materials necessary. Captain Westphal is doubtful about the idea, however. I'm going to talk to the other officers about it, and let him think the thing over for a day or two. In any case, we must penetrate as far as the river.

August 10

We camped on the riverbank. It was a wild picture. There are huge rocks in the river-bed, making a rapid and a gigantic waterfall. The rainy period has hardly started as yet, but the river is full of water and the cataract glints in the sunlight. There is a grotto reaching back into the rocks near the fall, as regular as though it were hewn out by the hand of man. I wonder if it really was so cut out, and by whom. Perhaps the Indians; in any case it reaches back into the rocks like a tube, at one side of which part of the water from the fall is drawn off to rush out again as from a spout and then down the rocks back into the river.

I clapped the captain on the shoulder when I saw it. Chief Engineer Janke and Dr. Hellmuth stood near us.

"Isn't this a marvelous place to set up an electrical power-station? The whole thing is done for us—almost without any further work being necessary."

"But the machinery you would need to make it available?"

"Simplicity itself. Do you believe that the *Prinz Christian* will be any use after some months?"

"Unfortunately, no."

"Do you believe that while this war is

going on any possibility of saving the ship will remain?"

"No."

"Well, then—we have the two big engines of the ship which can be worked up. And we will have no use for steam. Electricity from water-power, that's what we will use. We can stay here and work. We'll put my machines in order and found the giant farm I have planned. We will be working for our country as much as though we were there. The ship is hopeless in any case; we can cut her up and put her parts to very good use. And around here we will cultivate the fields—"

"We have no mechanics. The ship's crew—"

"Will help us set up the machines; they will willingly work for the wages we can afford to pay. We will found a German farm here. I don't want any more than the rest; let the whole thing be done on shares. Out of the proceeds, however, we must pay for the machines and whatever material we use from the ship first; after that the rest will belong to the company at large. You have seen what it is possible to do—"

Captain Westphal did not answer at once, but a little later I saw him talking to Janke, while the doctor and I were looking over the locality.

"Why is that water so dirty right here?"

Dr. Hellmuth bent down to examine a little pool.

"My God, that's not water at all; that's oil! If we bore here—"

August 11

We went back to the ship. The sea is like a mirror, and as blank; the waves are no longer washing over the ship, but the *Prinz Christian* has lain over on her beam ends, and is slowly sinking into the sand. The first officer, while we were away, managed to throw out a kind of bridge to the vessel, and has set up a solid-looking camp at its shore end. Yesterday evening a few Indians appeared in the horizon, stood there looking for a while and then disappeared. In case of emergencies, the first officer got the little saluting cannon set up. A few of the crew are ill—we hope it is not the yellow fever—and most of them are very discontented. They want to know how things are going in Germany. As to that, who can say? I held a long conference with the captain, the officers, and my ten engineering assistants, whom I had brought along to help me erect the machines when we reached San Francisco. Today I laid before them my plan for a farm and showed them the plans and model. It's a well-known fact that men, European men at least, wear out rapidly in the tropics. And the result is that lands which could furnish food for a population of millions are almost without any population whatever. Machines ought to do the work—they won't wear out. I showed them, with the aid of the model, how a whole farm of considerable extent can be cultivated from a central station, almost entirely without the aid of human hands. The only thing necessary is sufficient power—and that we have discovered. The captain stared at the model a long while without having much to say. I had the engineer get my accumulator out of the ship and set it up for a brief run. They are all there—the ploughing and cultivating machines, the harvesters, the threshers, and the packaging machines. The only thing needed is power, and time, and labor to make the installation. A huge clockwork can be built to run for a whole year or more, automatically, throwing in or throwing out certain wheels—such clocks are now in existence. Why cannot the same principle be applied to the operation of an entire farm? The central controlling mechanism, which gives the impulses to the minor controlling wheels, does not need to be larger than the mechanism of a clock. If this central controlling mechanism be well made, there is no reason why I could not work a tropical farm all alone.

The weather is very regular here. Every day brings the same amount of

sunny hours, the same rain. The alteration from month to month is slight if present at all. I could almost predict with absolute accuracy what kind of weather it will be here on next February first at three in the afternoon. The small alterations of the routine that do occur would make no practical difference. Just to think—on next February first my machines would throw in the necessary connections for ploughing and cultivating machines and a few days later the fertilizing machines and the automatic seeders. At that time of year it is rather dry—therefore I would have to arrange a rain-machine to run back and forth on rails and water the fields daily. I know how much cultivation is necessary for tobacco plants. But it would be easy to arrange machines that could do all this work without the intervention of the thousands of human hands that have undertaken it heretofore.

● As I explained all this to Captain Westphal, he sprang to his feet. I could tell from his air that he thought I had gone clean crazy; his face was fiery red. He turned to Janke as though looking for support.

"Is that possible?"

"In theory, certainly; the model is quite well worked out."

"But in practice?"

"It would have to be tried out."

"And then naturally, things might go wrong."

"It could be that way—but experience is the only method of finding out how far hand-work can be dispensed with. But we can be certain of this much—that the country around here is extremely fertile, for almost everything the heart can desire grows wild here already; that we have all the machines necessary to set up such a farm as Mr. Aporius describes; that the three hundred men on the ship will all become rich if it succeeds; and that they will furnish us plenty of labor to get the thing going."

I could have embraced Janke for those words. I had always thought him too reserved, too much inclined to stick in "ifs" and "buts," and when such a man as he showed this much enthusiasm—

Herr Stresemann, the first officer, spoke up.

"Gentlemen, most of what you say I am unable to understand. But I only want to ask one thing. What are we doing in Mexico? It offers us no opportunity of getting home again. Then I think it would be better if we all worked here as free men in a kind of republic, helping Mr. Aporius to set up the machines he brought with him on the ship. It would be a great shame in any case to leave the machines here for the Indians to get what they could out of them. It is a good deal better for the men, too, that they work here at setting up the machines than if they were trying to force a way through the jungle and perhaps get into the cities to discover that perhaps Mexico has gone to war against Germany, too."

August 12

We held a big meeting of the whole crew. The two hundred men of the ship's crew took part as well as the eighty mechanics I brought with me and the engineers and superintending engineers, the officers, and other people connected with the ship. At sea the ship's officers were altogether in command, but here I found myself forced into the lead, so to speak.

We waited till today for the meeting, meanwhile setting up a huge tent and erecting under it the scale model of the whole mechanical farm. I made quite a long speech explaining the project and the captain followed me with another. The first officer and Chief Engineer Janke explained the model to the people. The older members of the crew were all for the project at once, for they feared being interned. Some of the younger ones wanted to go to Mexico, or any other point they could reach, and from there get to Germany so they could fight. The captain tried to explain to them how impossible that would be. They

only quieted down when I promised to set up a powerhouse at the waterfall as soon as possible and use the power thus obtained to set up a big radio station. I thought of that from the first. The radio will have to be our newspaper, and will enable us to follow the progress of the war. We don't want to sit here for all eternity, and yet we don't want to attempt breaking out before it's time.

August 26

Not everything is going as smoothly as it might. Yesterday we had another Indian invasion. They did not seem enthusiastic when they saw what numbers of people we had and the first officer let the saluting cannon be fired. We will try to seek out a section of the country that has good natural boundaries and improve these boundaries by some kind of defenses. As soon as we get the powerhouse set up, it will not be difficult to set up a line of electric wires that should afford us ample protection. The captain has another idea. He points out that we ourselves are usurpers. We seem in a fair way to annex a section of Yucatan. We must not get outside the strip or we are likely to be expelled *en masse* by the Mexican government. Of course, it is altogether unlikely that any Mexican officials will show up around here, unless the Indians bring them down, but we must be careful not to injure the good name of Germany. Therefore someone must try to get through to Merida. They will be careful to make no mention of me. As long as we don't know just what the attitude of the Mexican government will be, it will be just as well if the world believes that the *Prinz Christian* went to the bottom of the ocean and took Wenzel Aporius and his lifework with it. I hope it will make the surprise all the greater later! Captain Westphal and Dr. Hellmuth will head the expedition to Merida and will negotiate for this strip of land. He will be simply a farmer named Westphal from Germany, who wishes to settle here. It will be easy for him to buy the waste stretches of land along the eastern coast of Yucatan, and once it is done we will be in our own ground. While Chief Engineer Janke and the people assigned to him went upcountry to the waterfall with the ship's electrical equipment to set up a dynamo, another party went back to the *Prinz Christian* with the second officer, and the captain, the doctor, and I set out to find boundaries for our domain.

As luck would have it, we had a couple of trucks on board. Janke leads the way with a party of machete-men to cut through the jungle, then comes the first truck, and finally a roller to make a road as far as possible. We had a tough time working through the jungle today and had to go most of the way on foot.

September 3

● We finally got to the waterfall today and found Janke busily at work with his people. A roofing has already been installed in the grotto, and some of the machines mounted up. Up on the cliff the antenna are already half ready.

We have managed to lay out boundaries after a fashion. On the east we are bordered by the ocean. On the northwest, west, and southwest we are shut in by the stream, the name of which we do not know, but which circles around our colony in a crescent formation. Northward it appears as a stormy mountain stream, flowing down through cataracts and rapids, on the south side as a more quiet river of the plains. The combination is excellent; in the mountain reaches it will furnish us with electrical power; lower down it will serve to carry our products to the sea.

Our southern boundary is a wide-stretching marsh district, and north are the mountains. This is the district they will try to obtain title to in Merida, describing it as well as possible by the map.

September 6

Westphal and the doctor started out early today. Once more there was an incipient mutiny. The younger men wanted to go with them. Finally we had

to settle the matter by letting ten of the loudest talkers go along. It's very fine of them to wish to fight, but I fear they are only running straight into misfortune. Four of the older men went along too, or the captain and doctor would be likely to find their homeward way difficult, for no one believes that the younger men will try to come back at all.

October 5

I have managed to riddle out the rules by which the weather operates in this country. All the year round there is a rain between one and two o'clock every morning. In the months between October and February there is more rain between four and five in the afternoon, accompanied by heavy thunderstorms. We have named the river "Wohltater" since we expect it to do most of our work for us. Since yesterday there have been electric lights burning on the plaza before the grotto as well as in the big house. The power-station is all installed. It was fortunate that we only had to put together the necessary parts and that the big flywheels of the ship's engines could be used as wheels for the dynamos, as it would have been difficult to do good machine-tool work here. I wonder what the Indians would say if they could see it? Electric lights in the wilderness!

I am working on a road from the ship to the waterfall. It will be very straight, and where needful, run right through a cut. All my machines will have to come up this way, and it is important to have the road good. As soon as it is ready, we will set the trucks to work hauling down the parts from the ships. Therefore we have all of three hundred men working hard at the road right now.

October 10

Received the first wireless messages today. It is a wild jumble of news, half-meaningless. The whole world is on fire, and even Mexico seems unsafe. Our people have no chance whatever of getting to Germany. This war will certainly last for years. We were indeed lucky to land here. But I wonder who will care for Lena, for little Lena and her mother?

October 20

The road is finished. Everything is moving along at double speed now. It was a good thing that the cargo of the ship also contained some concrete-mixing machines and the narrow-gauge railroads that Krupp built for one of the Mexican mines. They have come to Mexico all right, though perhaps not to the exact destination for which they were intended. This afternoon we had some of the track laid and began to pour concrete for our foundations. The nightly rain wetted it nicely, and in the morning it was hard as iron. The trucks have been installed on the narrow-gauge track as locomotives, and we have altered them to use electrical power from our own waterfall-station. The first load went through on them late this evening. The rest will be simple. The machines are being assembled. Fortunately for the exhibition, we have four little pavilions and a big house, in knock-down form, among the ship's cargo. They are being brought up to the waterfall. There is a fine valley here, a perfect park, shadowed by tall palm trees. The headquarters of the farm will be built there—the big building that was intended for the exposition. The little pavilions we will put out on the borders of our domain as watch-houses.

October 25

This afternoon we had the first piece of bad news. Toward noon Dr. Hellmuth arrived with three of the men. It is seven weeks since they set out on their journey. They found it exceedingly difficult, having to hew their way through the jungle with machetes at almost every step, and they had hardly any water but the rain that came every night. In Valladolid, which they finally reached, the ten young men, as they expected, deserted them and headed for Campeche through the forest. They were probably held there and interned. The doctor and the captain went on to Merida while the four

older sailors remained at Valladolid to wait for them. In Merida they had good luck. The government officials took them for a couple of stupid Dutchmen and were delighted to sell them a section of wilderness for a few thousand pesos. But the captain was not feeling well, and they missed their way coming back from Valladolid to our colony.

On the 16th of October, Captain Westphal died in the jungle, when they were two days out. The doctor and the three others were altogether exhausted by their journey. It appears that nobody followed them through the wilderness. The doctor brought the captain's will with him; he made me his heir as far as the ground here is concerned. That was only reasonable as he used my money to buy it with. Now I own this whole stretch of territory and the world is unaware that I am alive. But I wish the captain had come back. The first death in our colony. We are sad.

November 5

● Back home in Germany winter is beginning to come on. Here our first gang-plow has just begun its work. Along the coast there are storms, but they can no longer do us any damage. Not only have we plundered the ship's hold of all it contained, but we have stripped the vessel itself of everything usable in the way of wood, iron, and fittings. When I went down there to look the other day, a raging hurricane was sweeping the coast. The waves rushed along in giant masses, and as I watched them I thought how completely we are cut off from our homeland.

November 10

The machines are all at the waterfall and we began to set up the cable-lines and shovels. The iron that we took from the ship is coming in very useful. The ship's crew has plenty to do. They are going out in troops to get plants and seeds, wild coffee and tobacco, vanilla and cotton and sugar-cane. Nature itself is helping us to gather the things we need. While Janke directs the work with the plants, I spend most of my time in the headquarters house, studying over books on tropical agriculture and drawing up plans. Everything is being made ready for our machines to go into action. Already the wheels are beginning to turn and the engines to work. Our plows are digging up the land and we are burning the cut-away shrubs and grasses they leave behind them in their progress. I had a talk with the doctor today. The high-tension lines are installed along the northern and southern boundaries. On the east and west nothing of the kind is necessary. And since our electrical lamps are in action, I think we need no longer fear the Indians. In the beginning they came around a couple of times during the night. Now they think we are enchanters. There are almost no animals at all here—at least no animals worthy of being hunted. For that matter, we have no need of them. The ship contained any quantity of canned meats and the climate demands a vegetarian diet for the most part. We have nothing but insects to worry about.

We must try means of insect extermination. I think poison is the best available, and we will have to go at it systematically, mile by mile. The doctor is very decided on the point; he says we can never be safe till we get rid of all the insects in the locality.

November 15

Today we managed to intercept a few comprehensible telegrams. Most of the messages we get are gibberish to us. A German cruiser, the *Emden*, has been sunk. It must have done something important for the world to make such a stir over it. The Sultan of Turkey has declared a holy war, whatever that means. Great excitement in camp. During the night eighteen of the younger men got away into the jungles. Probably by way of the river. It would have been futile to try to restrain them; we cannot waste our time on that sort of thing. This morning on the opposite river bank from our colony the watchman in the pavilion

there saw a man's head stuck on a pole. The watchman informed me of it by telephone, for our telephone system is now installed throughout. Poor, poor friends. I hope that at least this sad event will serve as a warning to our other young bloods.

I went over the new nursery with Janke today. We have a big strip of land ready for planting now, and we are making experiments with barley and rye. Naturally they require a good deal of artificial watering. The lines have been laid and the rain-machines are all ready to be set on their rails.

December 15

I feel as though a great weight has been lifted from me, and one lack that threatened the success of our enterprise has been overcome. The oil in the ship was used up. And what would our machines do without oil? Now we have tried out the oil-spring that we found on our first expedition and found it crude petroleum of a good quality. After we had bored for only a short distance, it shot forth with considerable force. Now we have the well under control, and a big reservoir is being cut out of the stone in the cliffs. To this we are making leads from the well and from it, through a whole system of tubes, into the power-house. Dripping apparatus has already been installed for the dynamos. They work very well. Since they have been in operation we have found it unnecessary to care for the machines. This is approaching the plans I had laid out. It was a good thing that I had all the exposed parts of my machines plated with nickel or chromium. Now that they receive their oil supply automatically, they could work for years without the touch of a human hand. And I have managed to work out a system—a kind of perpetual motion—the machines provide electrical power, the electricity drives an automatic refining apparatus which has been installed between the well and the reservoir. The reservoir is high enough up so that it runs down into the delivery tubes, for the use of the machines, by gravity, and our bearings do not become overheated.

In other words, the hand of man has been eliminated from this part of the work. The automatic arrangement which turns the electricity for the lamps on and off at a given hour, also works well. Fortunately we have as much current as we can use, and no tax-gatherer to come around and tell us how much we shall pay for it.

December 24

● I am sad, thinking of my loved ones back home. Our people all gathered together and decorated a giant cactus with electric lights to make a Christmas tree of it. I wish I had my wife and child here. I would give the whole farm for an hour with them today.

January 1, 1915

I was awakened this morning by a terrific shriek. Janke had arranged a New Year's surprise for us, although it did not come at midnight but at two o'clock in the morning. He had, unknown to most of us, installed the big whistle from the *Prinz Christian* up there in a grotto in the rocks. We knew that every night it rained between one and two o'clock in the morning. Janke arranged on the top of the rocks a sort of rain-collecting apparatus, with a ball in its center. As the rainwater collects in the basin, it lifts the ball, of course, and when a quantity which, according to his computation, will collect in about an hour, is in the basin, the ball is lifted high enough to close an electrical contact and start the siren.

The whole thing composes a gigantic automatic alarm clock for the whole farm and its people, especially since the installation of the siren in the grotto causes the sound to reflect and be augmented into a terrific howling.

I immediately was busied with a new thought; this automatic alarm clock can be so connected up that at the same time it will set all our machinery in motion. It would not be very difficult a task to construct a series of contacts in the

basin below Janke's whistle arrangement, so arranged that when the water runs from his basin its weight will close further contacts. And to continue the matter, the water need not be released at once. It can be arranged like an old-fashioned water-clock, so that at a given hour, with the exhaustion of the water in the basin, all the machines will make holiday automatically—until the basins are filled once more in the early morning. That would be a fine step in the direction of removing all necessity of human labor from the farm.

But our holiday peace was interrupted once more. During the night twelve more of our young men got away and started out to try to work their way to Cuba across the water, in one of the ship's boats.

January 3

We have now been here for five months. Janke and I spend all our days grubbing over plans and the engineers are spreading the network wires ever closer and more complicated. All over the place the machines have been set up. Our experimental field has yielded its first fruit. It will be sufficient to supply us for months with all we need of bread, coffee, and tobacco. Now we are ready to begin on the larger scale. We have surrounded the whole territory with the necessary wires. The giant gang-plows are ready to go to work. They will plough up strip after strip automatically. Only one man to each machine, in a watch-tower, to see that the machines operate smoothly. Even he is not really necessary and is included only for observational purposes. I have arranged every machine so that it will return to a given place at night, and there be oiled and greased automatically. The overflow of oil will spill into a collecting basin and be carried back to the storage tank. We only need to be assured that our oil spring does not run dry.

But I doubt that that will happen. There seems to be sufficient to establish a really good-sized petroleum field, but we do not need it.

If only we were not homesick! I can tell, by looking at the others, that they fell as I do. Nothing to do but work. And even work, no matter how interesting, becomes boring with constant repetition.

It all seems wonderful now, how the work starts up at night, the siren blows, the big ploughs go into action automatically, every one drawing the necessary impulses for all its actions along the network of wires and chains. I hope the partners of this enterprise—

* * *

There was a gap in the book at this point. Then a whole leaf was empty and the writing began once more with other and fresher ink. The new writing must have been inserted very much later and there was no date line at the head of it.

I passed my hand across my forehead and looked around. Lena Aporius was no longer asleep. Unnoticed, she had come up behind me and had been looking over my shoulder as I read on, completely absorbed in the diary. Her eyes were sad and thoughtful.

And just at this moment the whistling of the siren was audible outside; that same siren of whose first whistling we had just been reading.

Lena opened the door and looked out. Outside once more the concert of the rushing wheels and humming wires had begun, and the eastern heavens were lighting with approaching day. Lena covered her face with her hands.

"He is dead. I know it."

I put my arm around her.

"Perhaps he is sick somewhere. Let's spend the day trying to find him."

CHAPTER VI

No Guiding Hand

● While Lena sat at her father's writing table, sunk in her own sad and lonely thoughts, I wandered alone into the dining room. I wondered at how weak I felt till I remembered that yesterday I had eaten nothing at all but the breakfast we had taken before setting out on

our wanderings. Not even in the evening had I tasted a bite of food. In our excitement over so many discoveries we had both of us entirely forgotten to sustain our bodies. And even now it was only my own weakness that made me aware of my hunger. Naturally, there must be a kitchen in a house of this size. Last evening we had not looked for such a thing, both of us being so concerned with finding Wenzel Aporius' workroom and his diary.

Now I noticed that a small track, made of a single rail, which very likely at one time had been used by the metal "man," ran along a passageway, out through a door and across a yard into a small separate building. What a happy land, I thought, where no doors were necessary to close the doorways! There was nothing before the door of either the house or the outbuilding but a curtain. I went toward it and then stopped; for out of the outbuilding came a sound—not merely the sounds of turning wheels, but a clatter of pans and dishes. I entered hastily. It was a well-appointed room, a kitchen that would have made any housewife in the world glad at heart, with a splendid line of knives, then many pots and pans that had certainly come from the big culinary department of the steamer. I saw a big electrical cook-stove, on which was a kettle in which water was already boiling as I came in. And now a long arm reached down and snatched up the kettle and lifted it over another. At the same moment the door of a porcelain chute opened over the second kettle. A quantity of finely pulverized cocoa fell out of the chute into the kettle, and it was shoved along automatically to the mouth of a second chute which discharged a measured quantity of sugar. Already the arm that held the kettle with the boiling water was at hand, and as the stream of sugar ceased, the water was emptied into the kettle that held sugar and cocoa, while at the same time a stirring instrument reached down and proceeded to stir the mixture.

I had already picked up a cup in one hand with the intention of finding something to put in it. Now I noticed that the arm was shoving the pot of steaming cocoa slowly toward the edge of the stove. I sprang toward it, and as the pot of cocoa began to tip, held my cup beneath it at just the right moment, and my cup was immediately filled with the cocoa. I reached for another, filled that also, and as I did so the arm plucked the kettle back again. Meanwhile on the electrical stove a second kettle of water had already begun to boil, very likely filled automatically by some water-tube which I had not noticed in fixing my attention on the cocoa. Once more the moving arm shoved the cocoa-kettle beneath the water kettle, received a quota of boiling water and returned to the stirring machine. This time, however, both the cocoa and sugar tubes remained closed. The stirring moved around in the kettle—and I understood. It was a washing arrangement which cleansed the dishes automatically. When it was finished, the arm returned the cleaned dish with its water to the same edge of the stove and once more tipped it up to empty it, then everything returned to its place. For several moments I stood gazing in open-mouthed astonishment at the ingenuity of the machine. Who had so accurately synchronized the whole thing? If the kettles came only a second too late, the cocoa would have fallen on the stove. And then another thought struck me—if I had not been there to take it at that precise moment, the cocoa would have been spilled like the washing water. I looked at the drain in which the latter had emptied, and now I saw for the first time that the drain was, in fact, almost blocked by an accumulation of spilled cocoa.

I looked around. This machine must also have a kind of clockwork that performed its duties regularly, day after day. Every day, at the same hour, it prepared cocoa, which some servant was supposed to take from it, and then automatically cleaned itself. The washing water, however, had probably not been able to carry off the accumulation of

cocoa that had gathered in what must have been the course of weeks. I could see that from the two chutes which discharged cocoa and sugar, leads went up through the roof and there probably were other leads from this point to the boundless storehouses. They would continue to function, of course, since the dry air of the place did not permit any matting together of their product.

As I stood for a moment with these thoughts passing through my head, the window over the stove was opened, and a long arm reached through it into the kitchen. A big kettle hung from it, which immediately proceeded to empty a quantity of water into the basin over the stove.

The arm vanished and the window closed itself again automatically. I looked around again. Right at my elbow stood a box, wrapped in wax paper, and by whose label I could make out that it contained breakfast biscuits. It had not been there before; therefore it must have come in automatically at the same time as the water. I looked on the floor. That whole corner of the kitchen was filled with a pile of similar biscuit boxes, none of which had been opened.

If one knew how often the machine prepared its cocoa, it would be easy to tell how long Wenzel Aporius had been gone by simply counting these boxes! But around me everything was quiet now, and I felt the need of seeing a human face once more.

I went in to Lena, whom I found still sitting at the writing table. She looked up when she saw me coming in with the breakfast. Then she sprang to her feet.

"Oh, but you're good. You even do my share of the work for me. I altogether forgot to get breakfast."

I smiled.

"I didn't do it all by myself. It was just one more of your father's machines that poured the cocoa out for me and handed me the biscuits."

Then, of course, I had to explain to her what had happened.

"But in that case it can't be so very long since he has gone!"

"Certainly not, and that is one more reason for hope."

I pushed her cup toward her.

"I don't think I can eat."

"You must, Lena—remember, it was your father who got this breakfast ready for you."

"My father!"

Her eyes filled up with tears again.

"You must be strong—for him."

"You are right."

● She took herself in hand and accepted a biscuit. The cocoa was delicious. When we had finished, I told Lena about what I had discovered in the kitchen.

I tried to finish with a joke.

"If that machine will only be good enough to tell us when it is dinner time! Perhaps it prepares that automatically, too."

Lena looked around and answered seriously.

"No. You saw the spilled cocoa and the biscuit boxes. If anything else were cooked automatically, there would be traces of that there too."

"You're right."

I shook my head.

"Think of all that cocoa wasted, and back home in Germany people are hungry."

We went out slowly. Lena took my arm. The busy sounds all around us, the whirring and humming of machines, the noise of a busy work-city without a single human being to control it, was somehow nerve-wracking. One looked around everywhere, almost involuntarily in the hope of seeing someone.

I believe that even the view of an Indian would have been heartily welcome. We went back and stood in the middle of the street, Lena holding tightly to me, when suddenly I felt her grip tighter and heard a slight, insistent whistle. A machine had rolled toward us and given warning of its presence! It had whistled to warn us. We sprang to one side, while

Lena stood there with widely opened eyes.

"How could that machine see we were there? How could that machine know we were coming? Did you hear it warn us? The machine warned us! It's insanity!"

I felt a shiver run up my own back at the thought. The colossus, at the crest of which stood a big water-tank, had gone on past. I sprang after it, certain that some living being must be in control of the mechanism. Then I noticed that up on the front of the machine, there were a pair of long spiral tentacles. I sprang forward, touched one of the tentacles—and once more the whistle sounded, insistent and shrill.

An automatic warning signal! It must have been these electrical feelers that touched me on the back, that gripped me suddenly, and not Lena, thus releasing the warning whistle. They were plenty long enough, as I now saw, to give anyone who had unwittingly gotten into the machine's path, full time to spring aside. Later I was to discover that nearly all the machines were equipped with similar feelers.

Once more we were at the machine house. There all the machines were working quietly as they had on the day before. The threshers were threshing, throwing the straw aside. We found another building in which cocoa-pods were emptied and prepared for the market or for use. It was provided with great trays which rolled out automatically and exposed the ripe fruit to the drying influence of the sun, then rolled back into place.

We went on.

In the middle of the huge machine-city, which reached away in every direction for acres, was a pavilion. A little concrete house it was, with a roof like that of a pagoda. Very likely it was one more of the little lodges such as we had seen on the frontier of this curious state. It was surrounded by a balcony over which a huge collection of wires ran toward the interior, making the place look like some telephone central.

"Lena, come here!"

Within was the most curious sight, the greatest wonder of all that we had seen up to that moment. The whole interior of the building was occupied by a single gigantic rectangular table, and on this table was a wonderful, a fantastic picture. It was a gigantic relief map of the entire farm. The whole was painted in bright colors. Along one side was the blue edge of the sea, along another the blue model of the great river. It was apparent that the northerly and southerly borders of the farm ran straight across level plains, and at these points a network of fine wires showed where the high-tension lines marked off the farm.

Before us the whole farm and its work was spread out. We could make out where the little lodges stood, could see exactly the building we had entered that first day on crossing the river, and could make out the wild tangle of vegetation, with this difference, that the strips of ploughed ground seemed wider than when we had been there. When I looked at the model I could see that these cultivated strips bore numbers from one to seventeen. And then, as I looked, I perceived delicate and diminutive models that showed cocoa plants and coffee plants, cotton fields and corn-fields, and farther down in the damper, southerly region of the farm, sugar-cane.

● But the map itself, wonderful as it was, was not so remarkable as another feature that accompanied it. And this feature was that everywhere on the relief map, tiny machines seemed to be at work, with little whirling moving parts, fine as those of a watch. And all these machines, ploughs and seeders, cultivators and harvesting machines, each bore a tiny number. On the walls of the pavilion behind us hung great tables. I counted sixty different ones, and on the relief map itself were sixty different number machines at work like the real machines in the fields. On each of the tables was a calendar, divided to show the work of the machine for the whole year round. I remembered that the giant gang-plough, the first machine that we had seen, was called "El

Diligente," and looking at the table I found No. 12—"El Diligente."

I followed the line of the calendar down. Today would be the 28th of February. I looked for the date:

"El Diligente works in strip eighteen, grading and harrowing."

I went back to the table. Number 12 was working away there in strip eighteen, the miniature ploughs. A special mechanism was gathering up the little miniature plants that had been set out on the relief map, so that one seemed to be seeing the actual machine at its labor, in a bird's-eye view.

We looked for the actuating mechanism. Underneath the great table there was a humming of gears. Then we saw that the whole map lay on a four-cornered device with glass sides. Through the glass sides one could look in and see the gigantic clockwork, or rather, when one looked more closely, sixty different clockworks, one for every machine at work above, and all connected together in a single central clockwork with a single huge pendulum that wagged back and forth majestically. And to complete the picture the whole system of clockwork was regulated by electricity.

This, then, was the soul of the whole farm. Each machine had its clockwork to control all its movements—a single big clockwork into which were worked all the necessary movements for the machine to carry out a whole year of labor according to the plans of the builder. As a clock strikes the hour on the exact second every time, so every movement of the machines was controlled to the second. Only in this case it was not a striking mechanism that went into action, but a series of fine electrical contacts.

On the calendar it read—"Gang-plough 17 will go to strip 8 on February 6 and plough there." On the proper day a contact would be loosened, and the stream of electricity would compel gang-plough 17 to go to the proper place and go to work there.

It was an endless clockwork, actuated from the central, automatically supplying the oil for all its complicated mechanisms, making and breaking its own contacts.

I remembered suddenly that gang-plough 7 was the one that had broken down the day before. I looked for the number on the relief map. The model obviously was not broken down, but it stood still in its place and a little red light over it was alight!

I looked around. Lena was standing beside me, weeping bitterly. I had never before seen her in such anguish.

"Lena, what's the matter?"

"This is my father's invention! That's the very model, the clockwork, on which we worked together for years and years. I remember how he used to talk with various planters to find out from them what all the phases to be controlled were. I remember how he worked out clockwork after clockwork. He wanted to take them all to San Francisco and I remember how even his friends used to laugh at the possibility of accomplishing anything with it. They said, yes, the model would work, but when it came to putting it into practice—and now here is the model and all the machines working outside there, just as he planned them. What does it matter if one or two of them have broken down? He has more of them than he needs. He had the idea of making hand labor almost unnecessary and he's done it; he's done it! Not a single man, not one. My father!"

Once more her tears began to flow, but as she spoke they stopped and the pride in her father's achievement overcame the feeling of sorrow. How beautiful she looked in her pride over him.

She went on.

"What are we doing here, standing still and looking around? It's noon already and here we are forgetting him. We've forgotten him to think about his work. Come along, quickly!"

I looked once more at the living map spread out before us. It was not complete—it told where every machine on the farm stood and what it was doing, but

as to the men—why couldn't it tell us of them?

Outside once more the sound of the many machines was audible. Where? Where, in this whole territory was there a living being? We headed back once more toward the headquarters building, going along past the coffee-drying machines, the machines that heaped up the ripe crops. the machines that ginned cotton and pressed it into an endless accumulation of bales. Ah, enchanted land—but where was its creator?

Behind the headquarters building the jungle sprang up again, deep and thick but only for a little space; beyond, it had been cleared to leave only a few tall palms stretching high to spread their grateful shade. Underneath was a long row of buildings that looked like barracks. Very likely the material from the ship had been used in their construction, for along the whole rank of houses ran a rail that was unmistakably that from the side of a steamer, and the buildings themselves were faced with planking and paneling that, we saw clearly as we came nearer, was the material from the decks and cabins of the vessel. Even the cabin doors with their regular series of numbers still attached were there.

● We opened the doors of the barracks and peered in. Each of them contained nothing visible but a couple of hammocks slung from the walls and a chest or bureau. In many, the hammocks were missing and only the hooks for them remained. In every cabin the picture was the same. Nothing.

Once in a while a couple of disused garments would become visible, a torn pair of shoes—but no trace of living man or recent occupancy, no sign of Wenzel Aporius.

In three long rows of a hundred cabins each, these barracks stood silently there. Three hundred men had once lived here. What had become of them?

Lena stopped, listening.

"What kind of a sound was that? The river is too far away!" We went outside, and I managed to shinny up a drain pipe to look around.

Immediately I stepped on the traces of another ingenius idea. The houses were roofed with zinc, very likely from the under-hull of the *Prinz Christian*. This zinc was carried up on all four sides to form a kind of high border. And from one side of it a tube permitted a stream of water to flow into the open tank thus formed on the rooftop, spreading out into a dozen little tubes that released a series of rivulets; on the other side they all collected and ran away down again.

"Lena, how wonderful! Don't you see how it will keep it cool in the cabins all the time, in spite of the tropical heat?"

We went slowly farther along the street of cabins. In the middle of the barrack-city was a free place, where the central line had been broken to permit it, and in the center of this was a building. A fountain played before it, and from its base ran out a stream that coursed away toward a drainage place sunk somewhat deeper. We went over to it and found that we were standing before a marsh.

But it was no such marsh as either of us had ever seen before. For out of it led a broad, slow stream like a lava stream, borne along by the water toward the distant river, and reaching back to a drainage tube that issued from the central building. And in the middle of this white laval stream were yellow flecks, brown and golden streaks.

"What in the world is that?"

Lena's eyes had opened to their fullest extent. I bent down.

"Do you know what that is? Food! Rice, cocoa, grits, everything all balled up together. The building in the center there must be the general cook-house, which cooks food automatically, just as the little kitchen in the headquarters building cooks the cocoa. No one has been here to take the food, and since the water cannot take it all away, it has overflowed like this."

We went slowly across to the building in the center.

It was a curious and unpleasant picture—a gigantic kettle, out of which reached

long arms of polished nickel; long tubes, out of which flowed the material for the repasts, from the inexhaustible reservoirs of the granaries of this place, and other tubes from which water came to cook it. But there was no one to eat the meals! Here also there was a calendar on the wall, and on it was entered the menus for the year round—a vegetarian menu for hundreds of men, setting forth exactly what would be cooked each day. But for weeks, apparently, there had been no one to eat the menus thus prepared, and thus one meal after another had poured out, until everything was swimming in uneaten food and the machinery itself, half drowned, only worked slowly and with difficulty in the midst of the mess.

The odor was one of foulness, of spoiled food.

"Come along, Lena!"

We hurried out again and found ourselves in the center of a lovely garden, in which every tree and bush was loaded with tropical fruits.

The balsam-like smell of pineapples, of oranges and bananas about us made us forget the stink of the overflowing kitchen. We sat down on a bench that still bore the name "Prinz Christian" and I plucked and handed to Lena some of the best of the fruits.

We found ourselves dead tired and felt as though our tongues were cleaving to the roofs of our mouths.

Our thoughts were running along the same lines, but it was Lena who first put them into words—"Where can they all have gone?"

The thought was one that I myself could not escape. Where had all the men of the place gone? Three hundred had been there at the start, Wenzel Aporius' day-book told us. Some of them had tried to make the trip through the jungle, no doubt, but what about all the rest? A couple of hundred men. It was in vain that I sought to think of some explanation. Were they dead; had some contagious malady raged among them? In that case there would have been dead men about, or at least some traces of their bodies or graves. Or were there vultures about as in the other tropical countries—no, no! Not to leave a single dead man? Not even in the line of cabins where they had spent their days?

They must have gone away, then. And had they left this place of their own free will?

Why?

To leave such a land of enchantments! Perhaps at the moment it was the only stretch of territory on the whole planet where everything needed for comfortable life existed in overwhelming quantities.

● What could have gotten into those hundreds of men to make them fly from such a place? What kind of revolution had taken place, the revolution that Wenzel Aporius had mentioned in the last queer scrawl at the very beginning of his day-book? What reason was there for a revolution of any kind here? Had there been an earthquake? No, that was impossible. There couldn't have been anything of that kind or the machines would be lying in ruins. Did he meet an attack from the wild Indians? No, that was impossible also, for they would be still here, or at least some trace of their pillagings would have been left.

Lena stood up again. As soon as her strength had been somewhat restored by food, her anxiety whipped her on to new efforts.

We went on with our hopeless and aimless wanderings. Once more we went through the big headquarters building, and then went on out, on the other side, into the cocoa plantation. Here also everything was as regulated as in a factory. With a whirring rush, protective screens were carried over the plants to protect them from the scorching of the noonday sun.

"We must keep on looking."

The young plants stood in long rows; they were just producing their first crops, and between them stood tall rows of rhubarb plants evidently set out there to protect the tender growths. As everywhere else, the whole plantation was laid out in

geometrically perfect lines, the cables ran everywhere in a network, and down them rolled the rain machines, discharging their cargoes of water, and plucking machines with spiral arms that reached up to gather the ripened fruits.

We went up and down, turned around and came back, rested for a few moments and then started out on new wanderings. For hours we wandered; then came the sound of the whistle, and everything was deathly still again.

"Time to quit work."

Lena wept. It was not merely the desire to find her father, but a combination of that with physical exhaustion and moral depression. Once more we had spent an entire day in fruitless wandering and exhausted our strength for nothing at all.

And then we considered how small the locality we had already searched was in proportion to the whole farm. Where could Aporius be? Where were his bones whitening? If I had not had Lena to take care of, I think that I myself would have completely abandoned hope at that moment.

Lena sat down on a stump, lost in her thoughts. I began to grow annoyed for not having taken her home before.

"We must get back to the house, Lena."

She looked at me sadly.

"Why? Is my father in a house?"

"Perhaps. If you'll only take it easy, we will stand a much better chance of finding him. We have been hurrying too much. We should have read his day-book through, right to the end, first. It is altogether possible that it will give us some clue as to his whereabouts."

"You're right. Let's go."

We moved silently down the path. It had become night again and the lamps were all alight once more. Lights glimmered everywhere across the fields and through the leaves of the plantations—white, red, and green lights—signals which those who placed them had understood, but of which we could make nothing.

How queer and frightening it all was! All day long was the sound of the working machines, so straining to the brain that understood there was no human hand to direct them, and now everywhere was the stillness of death. And all around were the suddenly arrested arms of iron, the giants frozen into static poses.

And now there was this utter silence in which there was not even the song of a bird, nor a single small night animal to run across our path. The stillness seemed to lie on our nerves with a weight almost physical—not to mention the fact that we were both tired and nervous.

We were glad to hear once more the whisper of the stream and the purring of the powerhouse, working away as usual. Although we had been in the place only two nights, as we went down the little alley to the house, both of us felt as though we were on the way to home.

Nevertheless we both felt a sudden beating of the heart as we approached the building. What had happened since we had left the place that morning? Could Aporius have returned, by any wild chance? Could someone else have come? We went slowly across the veranda and found—nothing!

And now all at once it seemed as though the house itself had somehow lost all its pleasantness and we entered with a feeling akin to fear.

Everything within was just as we had left it that morning, unchanged. I led Lena into her father's room and closed the door. She sank down on one of the divans.

"The day-book."

"We must eat something first—"

She sighed.

"The eternal eating!"

I tried to joke.

"The machines have it easier than us. All they have to do is take in a little current of electricity."

She got up wearily.

"All right, I'll see—"

And then once more she sank down.

"You're right. We must rest a little and then see where we can get something to eat."

"Oh, please, you stay here. I'll do it."

● She lay down again and closed her eyes. I, too, had to struggle against a growing sense of weariness, but I did not wish to sleep. After a few moments I could tell from her quiet and even breathing that Lena had drifted off to sleep. I went on into the kitchen. The cooking apparatus stood all quietly in place as we had left it, but one more of the little boxes of biscuits lay on the ground. I had shoved the pile of those that came before a little to one side that morning. Then the apparatus had automatically prepared its pot of cocoa once more during the day—that made twice a day. I bent over the boxes and counted twenty-eight of them. Then Wenzel Aporius had been gone only fourteen days!

At the back of the kitchen a little searching revealed a cupboard, its shelves well lined with preserved foods. At the sight my hunger woke again. I chose some of the tinned meats, canned vegetables, and prepared fruits, and after a little looking around discovered an electric apparatus for the warming of the preserved foods. I wished that I could discover somewhere a bottle of wine for Lena; she needed something like that. Good old Wenzel Aporius, you must certainly have found a little drink welcome from time to time. But the most painstaking effort only showed me a number of empty bottles and in the end I had to be content with tea.

I got everything ready, set the table in the living room, and then touched Lena lightly on the shoulder. She stared around her as she woke.

"Dr. Leaves? Ah—I—"

I laughed.

"I perceive you had a good sleep."

She came fully to herself with a sigh.

"And now, may I beg you to come. Dinner is served—"

"Really? I'm hungry."

We stepped to the table, and to my delight Lena did full justice to the meal I had prepared.

Afterward we went back to the inventor's study, and while Lena sat on the divan, I closed the door carefully as though to keep out any intruder, took the day-book from its drawer, and we opened it to let the forgotten man speak to us once more.

CHAPTER VII

An Inhabitant!

January 1, 1918

● We have been here for three years and a half. Since the attack by the Indians when so much of my day-book was destroyed, I have hardly had the heart to write in it any more. Now that I have gotten back to the job, I will run over what is missing, though I cannot spare many words to the task. That was a frightful night when we woke to find them suddenly all among us. Not all the machines were in operating order as yet, and the high-tension lines had not been completed. If Janke had not been sitting up late, they would simply have cut all our throats as, when he discovered them, they were already all around us. We had altogether forgotten about the possibility of their existence and had come to regard this part of the country as completely uninhabited. And there they were! Whooping and blowing on their strange trumpets they came storming into the house. I had no weapon at hand myself. In a moment they had beaten down our resistance and had set fire to the building. But Janke, who was sitting in the power central, recognized the danger and suddenly let lose the siren and started up all the machines in the middle of the night. If I had not been lying on the ground, tied up, I could have laughed. The poor, stupid Indians! They took the siren for the voice of a god, and our harmless ploughs and threshing machines for demons. They ran for their lives with Janke chasing them in the electric auto. There were only twenty of them, and I really was sorry that Kruger had to shoot at them from the doorstep of the power-central. He killed two of them, and it is a wonder that they didn't kill any of our people.

The only damage was that the fire spoiled part of my work-room and with it the greater part of my day-book.

We chased the Indians out of our district and set up service pickets around the frontiers, and since that time we have not been bothered by the Indians. Our lives went along as before, always the same. We cut up the whole territory into sections; every year a new section will be placed under cultivation. This year we cut in the last section but one; next year we will have in the whole territory right up to the river along the western frontier. Every three months Janke, Dr. Hellmuth, Kruger, and I have one secret job. We go up on the rocks, spread the antennae of the wireless station, and listen in on the wireless messages we can catch. Every time we go up full of expectation, and every time the result has been one more disappointment.

This frightful war goes on endlessly. Out of the little experimental stretch of territory the farm has grown into a huge undertaking, and still there is no peace in the world without. The whole world is burning up while we live here on our forgotten little island of peace. But we are hopeful. Although we can hear only English and American stations, we know that the homeland is still defending itself against the whole world.

It makes us at once both sorrowful and glad. It seems to me that we have a great mission on which we have chanced by the operation of some Providence, to prepare a kind of protective chamber from the walls of which the war shall be held far away. If we could only send some of our huge supplies of food and other products to Germany! I could build giant airships and do it if I only had the materials. But we have nothing here but the machines I brought with me and those we have put together out of the materials from the wreck of the ship. I can build nothing new; there is no metal, no other raw materials for the job. And when we have taken in the news, we take down our antennae, carefully put away the wireless material, and lock up the station. It is like Noah, sending out his messengers into the flooded world. Everything is still under water. But it would do little good to let the crew know what we have discovered —merely upset them. Our hour has not yet come; we must preserve our inner peace as best we can. Our people accept dumbly the news that the war is still going on. I am curious to see how they will take the news of peace when it finally does come.

We have constructed a series of barracks for the crew out of the ship's cabins. It looks very comfortable and convenient, with its three streets and plaza in the middle. There stands the general dining hall, and the dinners are cooked there automatically every day.

How punctual and reliable the machines have proven!

The great central clock-work is now ready and handles the whole job of coordination automatically. Everywhere we have set up streets and wire-lines. I have made a second and smaller model table, and set it up in my own room. It shows, like the big model table in the central, the whole farm, and I am having it connected up so that I can oversee the whole job from my room. Even if I should feel ill, I can lie in my bed and control all the operations.

We are like one big family, and yet there are small social differences. In the headquarters building dwell only Engineer Janke, Dr. Hellmuth, and myself, and we have only one servant, the old steward. He has an easy time of it, since even our cooking is done automatically.

Our life is quiet and comfortable. People laughed at me when I started out for San Francisco with so many of my machines, but now every one of them has become important, even those that we took out of the ship and made out of the ship's plates.

Janke surprised me with a little joke of his own on my last birthday. A dwarf, whose body was a box of machinery, appeared by my bedside in the morning. He had arms made of metal and in his hands was a tray. He runs on a rail from the kitchen to the bedroom. In his head is some kind of a phonographic arrangement that says "Please," a device taken

out of an American toy we had on the ship.

Now Janke has arranged a complicated mechanism which links up with the clockwork in the central station. When the siren blows and the machines start their work, this device automatically cooks a pot of cocoa, drops it and a box of biscuits onto a tray and the little iron man, we call "Jack," on account of his negro's head, brings it in to my bedside and says "Please." It's a curious sort of alarm clock that goes very well with the curious undertaking.

• The water and oil-leads are all ready and in operation now. Only the headquarters house has no water-lead for cooling, as it stands on a rock foundation and on high ground. On the other hand we have arranged an automatic water-lifting arrangement which brings a supply up twice a day for installation in the tank. I am exceedingly pleased with the way everything matches together and the manner in which the machines function.

Dr. Hellmuth also has reached the mark he set for himself. Since the high-tension wires have been set up, no more animals of any kind have troubled us, and he has undertaken to treat the ground chemically to free us from most of the insects, with the machines doing the job of distribution. For months no one has seen any kind of wild animal within the limits of the farm, except for the five or six parrots that have been tamed and placed in a cage near the headquarters building. When I make my little tours of inspection in the smaller of the two cars, I am genuinely proud of the results. The only reason why we need men around here now is to bring in new ground and see to repairs, as Janke alone can handle the whole farm from the central.

The yellow fever got in. It got through on us suddenly somehow. Every day we have a border patrol to walk around the limits of our domain. It's our only method of hunting for meat. We always find rabbits, and for that matter, larger animals that have dashed into the high-tension wires and electrocuted themselves. The patrol takes them out and brings them back to the kitchens. By this means we have managed to preserve the tinned meats we brought with us on the ship for special occasions, living on a vegetarian diet for the most part. Eight days ago our patrol found three Mexicans not far from the edge of the river and just outside our borders. All three seemed utterly exhausted. Naturally the patrol brought them back and made them as comfortable as possible in a corner of the big dining-hall. The news they told saddened us all that Germany should be lost! I could not prevent the whole crew gathering around to hear what these ambassadors of bad news had to say, and it was in vain that I tried to quiet them afterward. What kind of rumors are they that come through the woods like this on the tongues of ignorant peons? Our last effort to get in touch with the outside world by means of our wireless told us nothing of any smash-up on Germany's part. I promised to put in the antennae again and make another trial tomorrow morning, being unable to do it today.

During the night the three Mexicans sickened and Dr. Hellmuth declared that their illness was yellow fever.

We had them moved out to a special cabin at once, but it was already too late. The day after the next, five of our men came down with the disease. The agitation in our camp is something frightful—first the news brought by these foreigners and then this shadow of death!

The yellow death gains! It seems as though, having been protected against it during our long stay in the tropics, we were now doubly vulnerable. The whole of one street is just a gigantic lazaret. We have hardly any control, any more, over the crew. The men go about as they please; yesterday ten more of them went over the border. And they did not go together in an organized party—but each one for himself, full of fear that the touch of the others would bring him death. Every one of them has gone to cer-

tain destruction—ah, it is sad. They were the ten men of the patrol who had brought the Mexicans in. The other men practically drove them from the place. A long row of graves has been dug near the little pavilion under the palms that we set there as a guardhouse against the Indians.

Fifty men have sickened—and the others go dumbly about the task of digging graves. I fear for the day when there will be none left to dig graves for the rest.

The yellow death has reached into the headquarters house. I was sitting beside Janke's bed. Yesterday it gripped him. We both know that he is a lost man; we have no proper medicines. It is curious how when anyone recovers from the disease, it always seems to be one of the weakest and least resistant. All work has ceased. Why should the men labor—when the yellow death will take them from everything tomorrow? In the camp, we have divided into three groups; first, the few whom the disease has touched and spared. They are weak and pale, but they are the only ones who dig graves for the rest. They believe they are safe now. I wonder if it is true? Dr. Hellmuth says not, but I am glad to let them believe it, since they wish it that way.

Then there is the great number of sick ones. They also are calm, though by an effort and against their own will. They lie there in rows, dumb, crying, according to what stage in the fearful illness they are going through. And finally there is the last group, those who are still healthy. They are really almost unmannered, for every one of them regards all other men as enemies who may bring him death at any moment. I have seen many epidemics, but this is the worst I have ever passed through anywhere.

The rainy season seems to have been somewhat damper this year than in the past.

● I was alone with Janke, as I said. He began to shiver, and I knew that he was in his last agonies. Janke!—my good friend, my best assistant. It was as though I were losing a brother. He woke from his fevered sleep and looked around him, looked around out of his burning eyes and recognized me. He managed to stir and reached out his dying, fevered hand toward me. I bent over him and tried to wipe his forehead, but he pushed me away.

"Go! Go!"

"Janke, it's I."

"I know it. Go away. I beg you, go away."

"But why?"

I did not understand. There was something so painful, so hurt in his expression.

"Are you angry with me? Are you blaming me?"

"You must not die, Aporius, not you!"

He almost screamed the words, then seemed to fall in upon himself and wept. Dr. Hellmuth came in and bent over him.

"He will be done in half an hour."

I felt an unreasonable annoyance. How could he say such things in that cold, judicial voice? He went on.

"You know what we can do for people who have this disease. It isn't a great deal . . . .

"Doctor!"

I looked at him and discovered suddenly that his face had a yellowish tinge and his hand shook. He saw that I understood, nodded seriously and bent over Janke.

"Doctor, you must take care of yourself. You must not be sick—you—"

"That's the last one."

He straightened up again.

"I've known it since yesterday. By tomorrow at this hour, I expect I will be dead. With my weak heart, this yellow fever will certainly be too much for me. When you get home—there's a girl there on the banks of the Rhine who is waiting for me. It's all the same—in the war, or out here. I don't doubt but that she thinks I'm dead already—years ago. And—there's my mother. If you can find her, will you manage to get this letter to her?"

He spoke quietly, without altering a

muscle of his face, in a quiet, even voice, and yet we all knew how willingly he would have escaped, how desirous he was of seeing once more the girl there in Germany, and his old mother.

"My dear doctor!"

He turned to me.

"Don't weaken, Aporius; for Heaven's sake, don't weaken! What must happen, must happen. Good luck to you!"

He turned around and strode slowly, with sounding, heavy steps, toward the door, then suddenly threw his arms over his head and crashed to the floor.

I bent over him. A heart-stroke! Dead! Who knows how long he had already been struggling against the dread disease! I turned back to Janke's bed. His shivering fit had left him and now he lay in a peaceful slumber. I felt that I had to wake him and hear a friendly voice once more.

"Janke!"

No answer! I shook him—and discovered that I was standing between two dead men. I was all alone in the headquarters building.

I ran out into the pouring rain without noticing that my clothes were wet through; I ran, just to get away, without any definite objective, and discovered that I was near the wireless station.

It was early; just as I arrived there was a dumb noise, then the siren howled and the work of the mechanical farm began. In the first light of dawn I stood there on the height, with the breeze blowing around me, shivering with the cold of my drying clothes and looked around. The machines were going quietly about their tasks. They were unaware of the tortures the human inhabitants of the camp were undergoing. They knew neither the yellow fever nor the pains of death.

I saw no one!—nothing but the machines. In my fevered imagination I realized that we men were dying, the last of our race. We were all dying. Perhaps they were already all dead but me. And I stood there in the morning breeze, freezing to the marrow. Of course—probably I too, bore within myself the seeds of the illness that had killed the rest, and I too, would die. And then there would be no living thing in this camp, but on every morning the machines would take up the work as though nothing had happened. They would plough and scatter seed, tend the crops and gather the harvest, as though there were someone to order every movement they made, and their iron thews would struggle with and overcome the ancient jungle.

I began to be afraid of these mighty giants of iron.

And then I suddenly burst out laughing. For there would still be a human voice in the place even then. Jack would come in each morning from the kitchen to my bedroom and say "Please" as before—Jack, the only one of the machines that knew how to speak. I wondered whether he would manage to make himself lord in this world of voiceless machines, whether he would—

I laughed and became afraid of my own laughter. Down beneath me there was a sudden sound of rending. Some machine had given way in a vital part and had broken down.

And to tell the truth I was almost glad to remember that even my machines were destructible. How yellow the sun is today!—the sun of the yellow death!

* * *

My reading was suddenly interrupted. Lena screamed and ran toward the window. Against the shutters, gazing through the slits at us was a face—a fearful face with a broad, flat nose.

It was the face of a man.

CHAPTER VIII

A Surprise

● With a single bound I reached the door, tore it open, as I reached for my revolver with the other hand.

"Father, is it you?"

Lena had cried out into the night—but there was no answer. I also shouted—nothing. But we had both seen the face without any possibility of doubt.

"Is it possible that we made a mistake—"

"No, not at all, but—my father—I don't believe that the face—but it was only there for a second—"

We called out again, and for answer there came a sound like an absurd giggle through the night, but it seemed to come from above, somewhere up on the heights.

"Who's there?"

I lifted the revolver and fired it into the air. At the same moment it became dark all around us; the big bulb that lighted the plaza fell to the ground with a crash.

"You—"

"I didn't shoot in that direction. I shot off the other way, as a matter of fact. Someone must be up there on the roof of the building."

"Then it certainly isn't my father—"

And now we heard a slipping and crashing sound, and a couple of tiles flew past our heads.

"Indians?"

"In any case, someone who doesn't seem to want to be friendly with us."

It had become completely dark all around and was raining gently. We stood together in the open doorway. The house was a poor place of defense, for Wenzel Aporius had evidently not counted upon dealing with invasions. The best we could do was stand close by the open door in the dark and wait till the enemy tried to get through one of the big French windows.

We seemed to wait for ages; finally the siren blew, and then the gray dawn began slowly to show. And in that feeble light we saw a being, bowed over, cross the courtyard in long springing strides. He seemed to be wearing a gray mantle. I called again; Lena called; no answer—the being vanished.

We hurried in the direction he had taken. Was it Aporius? And who else could it be? In any case, if it were a man at all, it must be an insane man. I said nothing, for I was afraid that it was in fact Aporius. Slowly it became clearer around us. We found ourselves before the power-house, having kept right on in the hope that the being would continue in the same direction.

"Over there!"

Lena screamed the words, full of fear. Right over us, next to that wall that retained a part of the basin was a tall mast that must once have borne the wireless antennae.

On the roof of the building itself stood the being. I had stupidly forgotten to bring the glasses in my haste. The being stood upright on the roof, holding onto the mast with one hand, and waved abroad a big flag—or was it the mantle he wore.

"Is that your father?"

"I don't know—I can't make out—in any case, it's someone who seems to be beckoning for help."

We clambered up the rocks as fast as we could.

"We're coming! We'll help you! Aporius!"

The person looked down at us. The sun had burst forth, all at once, as it always does in the tropics, and stood directly behind him, so that it was impossible to make out who it was for the glare of light.

"We're coming! We're coming!"

And now from above there came a kind of high, piping laugh; the person threw both arms up into the air so that his cape fluttered down, and then—he let himself drop. Lena screamed once more. We reached the rocks at the edge of the roof and saw where a piece of the mantle hung to it as a notice that we had not imagined the whole crazy chase, but there was no other sign. I climbed down again; we looked around, calling—nothing, no answer.

"Even if he went down by the edge of the stream there—see, there are handholds and footholds all the way down. He's probably down there among the rocks somewhere." I clambered down again, calling.

"Lena, if we weren't fully awake, I would be inclined to believe we were

dealing with a ghost or some product of our imaginations."

"Look, here's a torn piece of the mantle!"

I picked up the fragment of cloth; it was a piece of wool into which some waterproofing material had been worked.

"Father used to wear—"

I understood.

"Lena, we'll look. If his body isn't here, he must have gone somewhere."

"He's crazy."

"Perhaps he's just over-excited. Such a surprise. He takes us for enemies."

"My poor father!"

We looked over the ground in all directions; we went through the network of wires and machines. Lena kept on calling. I myself urged her to it, since if Aporius was out of his mind, his daughter's voice might help to bring him to himself.

Nothing.

And then once more a stone fell close beside us, as though someone had thrown it.

● We worked our way back to the central building and mounted the steps once more. Today we had no eyes for the wonderful model, only cautiously peered about here and there. And then once more we saw him not far away. That is to say we saw someone moving in the straw, saw the edge of the mantle, which seemed to be all rent and torn. The person was striking at the straw with the edge of his mantle, and crying and laughing both together. We sprang toward him; he leaped away again, across the courtyard of the central, and as we watched, we saw that he seemed to be going on all fours. One of the big ploughs came past; there was a sudden, wild shriek—and it was all over.

We ran breathlessly toward the plough, which stood there with its iron members moving slowly. Lena stood gazing at it with trembling limbs, but I laughed aloud.

"A monkey!"

It was a big howling monkey, which had run right into the whirling machinery.

"But how was it possible—"

Then it came to us—neither of us had really seen the being that ran before us. In the dark we had only a wild impression of moving limbs and of the mantle.

"But—"

"Very simple. Either the high-tension wires have broken down somewhere, or the animal got through them by some chance. He was certainly alone, or we would have found traces of others. Another coincidence brought him to the roof of the headquarters building when we were there. It was from the roof that he threw down the light bulb, and when he saw the light inside he came to look through the window. All we saw then was a pair of eyes, and then he ran away again. First he climbed up on the roof again.

"And for that matter, I know now where he got the mantle. It was that cape of your father's that I left on the veranda yesterday."

Lena laughed, her heart lightened.

"My poor, dear father, forgive me."

"It was only natural, Lena."

She sat down by the torn remains of the poor animal.

"Poor fellow. And now we are responsible for his death."

I laughed again.

"Let's be glad that it turned out that way. In any case, you can see that it opens up the possibility that there are other living beings here. Let's go back to our house, for if this monkey could get in and commit suicide unwittingly like this, it's quite probable that there is an opening in the barriers somewhere that would let Indians in too."

She shook her head.

"The Indians are too superstitious."

"You're probably right about that. Shall we go back to the house then, or shall we spend the day looking around again?"

"Looking."

We had no particular objective. We did not know where he could be; the whole wide farm was all one as far

as our search was concerned. Today we wandered along the bank of the stream, eastwards. It was the northern border of the farm, and by that token the most elevated. We hoped that we might find some point where we could see down it for a long distance. After some way the stream made a wide bend to the north; at this point the high tension wires began. There were two thick cables, one of them running through a little trough, fashioned of metal, and which also bore its current of electricity. The latter was filled with insects. Higher up there was another wire, and along it hung animals and birds, sacrifices to their own curiosity. Among them was a big hare of some kind, evidently newly killed. Lena would have reached out for it, had I not withheld her.

"Look out!"

We saw some bird of prey wheel down from the heavens, fall like a bullet on the rabbit, and at the same moment as the electricity struck him, with a single wave of his wings, fall dead across it.

"Lena, if you—"

She smiled and looked at me with level eyes.

"You have saved my life once more."

And then suddenly she became serious.

"That's a real protection against men and animals."

"And it hasn't fallen into ruins, evidently."

"If the farmers wanted to collect their prey, all they had to do was cut off the current for a few minutes."

Lena looked around.

"But how in the world did they keep birds from flying over the wire? There aren't any birds on the whole farm."

"We'll need years to find out all the riddles this place holds, and we've only been here a week."

For some time we continued our way along the borders of the place. Along the edge, the ground was practically uncultivated and wild agaves showed the beautiful blooms from which the Mexicans make the fiery *pulque* they drink. We might have turned back before, had we not come on a little row of tracks, leading away among the vegetation. At the end lay another of the little lodges or pavilions, such as we had met with on our first day, and there was a little work near it.

It was the oil spring, and beside it was the automatic refinery. It was lucky for the colonists that they had been able to find such a thing here.

It had become noon by this time and was already very hot. We entered the lodge. I no longer sought to hide the thick dust from Lena, but here also we found a plentiful supply of tinned foods, and also a couple of crocks with long-forgotten *pulque*.

"This must be the northern house that father spoke of."

"And he isn't here."

"Therefore let's look more to the west and south. I am certain that he has not left the farm."

● After we had rested for some time, we started back again. As it was all the same to us whether we took the way we had come out or another, we followed the tracks this time and found that they took us direct to the central plaza.

We stopped to glance around the living picture in the central. Today everything went forward smoothly as before, controlled by the master clockwork. No machines broke down. We went back slowly toward the headquarters building. Here, however, while Lena sadly got something ready for us to eat, I thought it would be a good idea to go through the building carefully and close all the doors with wedges; not so much out of fear that anyone might come, as to protect us against surprises.

Tonight it was still early when Lena once more sat by her father's work-table across from me.

"One day more."

I was really surprised at how calm she was.

"Tonight we will certainly reach the end of the day-book, and then we will

see. What more can we do than we have done?"

"Nothing."

She stood up with a sigh and poured some cold cocoa into my cup. This time we had filled the pot with it and kept it by us; it seemed somehow wasteful to let so much good food run to waste, and I had not succeeded in finding the device that uncoupled the automatic cocoa-cooking arrangement.

It was only eight o'clock when I took up the day-book once more.

(Don't miss the masterful conclusion to this classic novel in the next issue!)

To Be Continued

THE LIFE DETOUR

By David H. Keller, M.D.

(Continued from page 1079)

heavy water and two kittens to work and then we saw what your idea was. You must have thought you could get along without the Otherons. I had to keep quiet. If I had told my friends, they would have become excited and might have tried to cross the Bridge, and then someone would have been hurt, maybe killed. And I did not want to be killed myself, just when Ruth was expecting me to marry her. But I had to do something. Under the waterworks, in the basement, there were two twelve-inch water pipes, one furnishing water to one side of the Bridge and the second to the other side. Of course, as soon as the heavy water machinery was turned on, it would supply the pipe leading to the Otherons' homes. I went down there and put in a double detour. I crossed the pipes. Then, after I started the heavy water machinery, the new water started to supply the Upperons. Of course, I was not sure what it would do to you, but I knew what it did to Ruth's cat."

He paused long enough to draw a picture.

The old man took the picture and held it close to his near-sighted eyes so he could see it better.

"We were wiped out by a detour," he sighed.

He tried to sit up in his chair. "What are you going to do now? With the Decimals and the Old Man dead, what are you going to do? Who is going to run Victorus?"

"It seems to be doing pretty well without you," answered the woman.

"After all, you were only great and powerful because none of the Otherons had imagination to see you for what you really were, or that none of the Upperons were really necessary to the life and welfare of the real city. Henry and I will go back, and if there is a need for leadership, I think my husband and I have enough imagination to take charge of things. They may some day call him Primus."

But the old man had died in his chair.

Back they went down the stairs, through the city of the dead and out on the Bridge. Ruth took a visiting card and stuck it under the robin's nest. On it she had written:

NO THOROUGHFARE
CLOSED FOR REPAIRS

"And now I guess I will have to get a new job," sighed the inventor.

"You have one," answered Ruth. "You are going to be the first Mayor of Victorus, and I am glad it all happened as it did. I do not believe I should have liked living with those Upperon ladies. I bet they played poor bridge."

THE END

EARTH'S BIRTH THEORY REVISED

Gas Accretion Near Larger Similar Phase Urged

Sun Deemed Possible Cause of Related Condensations

Concept, if True, Said to Hint Planet Systems Usual

Pasadena, July 14 (AP) — Dr. Gustaf Stromberg advances a theory that the earth was formed "by an accretion of gaseous material in the neighborhood of a bigger condensation, the sun."

If it was so formed, said Dr. Stromberg, an astronomer of the Carnegie Institution's Mt. Wilson Observatory, there probably are many other planets similar to the earth throughout the universe.

ONCE OF LOW DENSITY

"In nature slow changes occur everywhere," he said, "and these changes have, so far as we know, been going on for thousands of millions of years. Even the earth and the sun and the stars have not always existed as individual celestial bodies, and we have reasons to believe they have all evolved from a primordial gas of extremely low density.

"Gravitational attraction would cause the gas to condense into denser bodies, and also to produce rotating systems of great dimensions. During this proeess the motions in the gas become more and more regular, due to a progressive mixing of gaseous material.

INDIVIDUAL ROTATIONS

"It can be shown that if suns (stars like the sun) are formed in such a way they would themselves move quickly around the center of the system. They would also individually have rotations about their axes.

"The way any individual star moves depends on its distance from the center of the Milky Way and upon the time of its formation. Some stars have been formed before and some stars after the irregular motions in the gaseous material had been replaced by a more quiescent state of motion. A great number of observed facts regarding stellar motion can be explained and understood from such a theory of development.

CONCLUSION FROM THEORY

"It is interesting to note that if the earth has been formed in such a way—that is, by accretion of gaseous material in the neighborhood of a bigger condensation, the sun—the existence of planets around other fixed stars which are similar to our sun would be a rule rather than an exception.

"On the other hand, if the earth has been formed from material ejected by the sun, a theory developed by Sir James Jeans and others, planets like those in the solar system are very exceptional bodies in the universe."

GEORGE H. HERBIG.

THE ROBOT ALIENS

By Eando Binder

(Continued from page 1057)

Murphy rolled a haggard, wistful eye at the clock. Two A.M.! And he hadn't had a wink of sleep yet! In fact, he hadn't had much sleep on night duty at the switchboard any more since the meteor had landed.

Lieutenant Arpy started version number 865. . . .

* * *

"Now, I had a suspicion *all* the time, Peabody, that those Robot Aliens were from Mars. Of course, I didn't say so in my interview because I wasn't quite decided at the time and thought it better to make it general. But, if I'm not mistaken, I was the *first* to even suggest an extra-terrestrial origin for the Robot Aliens. Wasn't I, Peabody?"

"Yes, Professor Honstein. By the way, sir, you speak tonight at the Astronomy Conclave on the subject of 'The New Orbit of Pluto.'"

Peabody was the forgetful professor's faithful Boswell and memorandum pad. Such reminders as this he had just made were absolutely necessary in the savant's haphazard life.

"Oh, tut, tut, Peabody. 'The New Orbit of Pluto' be hanged! I am going to speak tonight to my brother astronomers, yes, but not about Pluto. I shall speak, Peabody, on my personal experiences with the Robot Aliens! We must not forget that I was the *first* to suggest that they came from extra-terrestrial regions. . . ."

* * *

"Confidentially, though," whispered Captain Pompersnap to his ogling relatives, "I myself saw the folly of attacking the Robot Aliens without first ascertaining if they had any belligerent tendencies! You know, we men of the Army must obey our superiors without question, mentioning no names!"

His sly manner told much to the listeners, who one and all thought his actions had been above reproach. . . .

At the same moment, the arrogant Major Whinny was subtly hinting to a group of fellow politicians that higher authority had also misled him. . . .

Under similar circumstances, Colonel Snoosharp pointed an accusing finger at Washington. . . .

Secretary of War Rukke and the President volubly agreed that the "misinformation from Fort Sheridan" had caused the war-action on peaceful ambassadors. They, obviously (with a suitable air of innocence), were hardly to be blamed at all. . . .

A week after the work called "The Robot Aliens" was published, a mob stormed the Miller mansion at Owensboro, dynamited the last Robot Alien to nothingness, and burned Frank Miller alive. Their reason (later published) stated that Frank Miller was a Frankenstein who had loosed his irresponsible brain-children on a peaceful world and then attempted to cover his malign sin by concocting his cock-and-bull Mars story. Having always been a decided recluse, not given to associating much with general society, the mob had no trouble in believing he had always been a secret experimenter and had "made" the Robot Aliens in a spell of madness.

Of the storm of controversy and denouncement which that hideous action aroused, and of the bloody but short civil war that followed, we will say nothing. But we will add that Frank Miller is only one of many geniuses who died martyrs to their enlightened beliefs. People of reason and high intelligence admit that some day Mars will again send proxy ambassadors and vindicate his memory.

After all (it should be plain by now), "civilization" on Earth has only begun.

THE END

YOUR DREAM COME TRUE!

More stories—more pages—more departments—more letters—more illustrations—better paper—smooth edges—

These are the things that you readers are asking for! You have always wanted them, and we have always wanted to give them to you, but have not, up to the present time, found it financially possible—for all these things take money, you know.

But don't think that you will never have these dreams come true—it may be a matter of only a few months. It is very simple. All we need is an increase in circulation, and you will find it very easy to help us out. You would be surprised how many of your acquaintances would be willing to buy and enjoy WONDER STORIES every month if they could first be persuaded to read one issue.

Now here's our plan: purchase an extra copy of WONDER STORIES this month and give it to that person whom you think would be the most interested—one, of course, who does not already read the magazine. Tell him that you paid a quarter for it out of your own pocket—just so that he could have a brand new copy for himself. When he realizes that you have sacrificed something, even if it is only twenty-five cents, for his enjoyment, he will feel obligated to read the magazine—and when he does, he will very likely become a regular fan and purchase the magazine for himself henceforth. And for that extra twenty-five cents that you spent, you will soon find all the improvements in the magazine that you have been asking for.

Of course, you could just give your friend one of your own copies of WONDER STORIES, but we recommend the above method—it is more likely to work.

Make it a point to interest at least one new reader by the end of this month—and *we'll* make it a point to give you those things you have been asking for!

THE EDITORS.

WHAT IS YOUR SCIENCE KNOWLEDGE?

Test Yourself by This Questionnaire

1. Compare the human eye with television. (See Page 1031)
2. What is "semen" and "spermatozoa"? (See Page 1031)
3. Where are the "chromosomes" found? (See Page 1031)
4. What, in astronomy, is "Aries"? (See Page 1034)
5. Do we know of anything with a speed greater than that of light? (See Page 1057)
6. Does the planet Mars show any signs which may be taken to be seasons? (See Page 1058)
7. Where were the Martian canals first seen? (See Page 1058)
8. Where is the Flagstaff Observatory? (See Page 1058)
9. What is "heavy water"? (See Page 1078)
10. Give the formula for ordinary water, and tell what it means. (See Page 1075)
11. What is Deuterium? (See Page 1075)
12. How much ordinary water would it take about to yield one gallon of heavy water? (See Page 1075)
13. Where would heavy water be found in the greatest quantities? (See Page 1075)
14. What is the value of heavy water? (See Page 1075)
15. What is "pulque" and from what is it made? (See Page 1126)
16. What is often called "the perfect insulator"? (See Page 1131)
17. With what kind of light are the best photographs of Mars made? (See Page 1131)
18. Where is the *pineal* gland located? (See Page 1132)
19. Is the static machine of any practical value? (See Page 1132)
20. Tell why the mouth of the Mississippi River is called a "delta." (See Page 1132)

Science Questions and Answers

THIS department is conducted for the benefit of readers who have pertinent queries on modern scientific facts. As space is limited, we cannot undertake to answer more than three questions for each letter. The flood of correspondence received makes it impractical, also, to print answers as soon as we receive questions. However, questions of general interest will receive careful attention.

THE ASSOCIATE SCIENCE EDITORS OF WONDER STORIES

are nationally-known educators, who pass upon the scientific principles of all stories.

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Professor William J. Luyten, Ph. D.
University of Minnesota.

ASTROPHYSICS

Donald H. Menzel, Ph.D.
Harvard College Observatory.

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Acting Director, Psychological Clinic, University of Hawaii.

ZOOLOGY

Dr. Joseph G. Yoshioka
Yale University.

Insulation in Space-Ships

Editor, SCIENCE QUESTIONS AND ANSWERS:

Here I am, in again, and since I'm in, I might just as well pop the question I got in here for.

Prepare yourself—I am either about to blow up one of the fundamental and most sacred theoretical bases of science-fiction, or make a silly ass of myself.

This refers to the insulation between walls of space-ships which is to keep out the cold—or heat—as the case may be. Numerous almost-negative carriers of heat and cold were found and tried out in various stories, but finally authors arrived at the conclusion that nothing was as nearly perfect in resisting temperature as a vacuum.

Hsh! Correct me if I'm wrong. If space is cold, that cold has traveled, is traveling, and will travel, for unmeasurable billions of light years, and through a vacuum as perfect as can be imagined. It freezes isolated planets and asteroids, but when it bumps up against a space-ship, and finds it has another foot of vacuum to penetrate, after that enormous distance, does it get tired and go home?

The same with heat, coming from the sun. It penetrates vast interplanetary distances, giving light and heat to planets. Can it be stopped by a mere few inches of steel and the same sort of vacuum it has been passing through for millions of miles?

I may be quite mistaken, but it strikes me that authors of science-fiction have more or less overlooked this problem.

D. H. GREEN,
Beverly Hills, Calif.

(In the first place, "space" can neither be hot nor cold, for, as you say, it is a nearly perfect vacuum, and "nothing" can have no temperature. Temperature is a phenomena peculiar to substances only—whether gas, liquid, or solid. The double-wall used by so many of our authors in their space-ships, with a foot of vacuum between them, is only for double-insulation. For instance, the rays of the sun are converted into heat when they strike the substance, which is the metal outer-wall of the space-ship. Now the wall should be painted white, to reflect the rays of the sun, or better still, made of aluminum. The heat that is absorbed is taken in by the outer wall, and the inner wall is protected by the foot of vacuum, through which the heat, or cold, cannot be transmitted. The outer-wall acts like a shield. This can be exemplified by a person wearing a wide-brimmed hat in the hot sun. The hat, or "outer-wall," shields the face, or "inner-wall," from the heat of the sun. The vacuum is the perfect insulator.—EDITOR.)

Canals, Infra-Red, and the "Third Eye"

Editor, SCIENCE QUESTIONS AND ANSWERS:

1. Is it not possible that the "canals" on Mars are entrances to underground homes of the Martians? The nights must be extremely cold, and the heat from the interior could be thus utilized.

2. As the planet Mars is visibly red, would not infra-red photographic plates bring out features unknown to sight? It would seem that these plates could be used to advantage on other planets.

3. I have read allusions to a third eye present in the dark ages of evolution. Could you give information on this point?

WILLARD DEYO,
Wellsville, N. Y.

(1. It may be possible that the "canals" of Mars are entrances to underground cities of the Martians, as you say, though we can't see why an "entrance" would stretch out for thousands of miles. However, Martian psychology is very likely quite different from ours. At any rate, there is no way of proving as yet just what the canals are. They have been called "canals" because Schiaperelli, the discoverer of them, thought that they might be waterways to irrigate the dry lands of Mars, which is one logical deduction.

2. Astronomers already use infra-red photographic plates for closer study of other worlds through the telescopes; and the best photographs of Mars are taken by infra-red light.

3. The "pineal" gland in the head has often been alluded to as the "third eye," because no one knows

just what its function is. It has been thought that this peculiar gland may somehow provide the "sixth sense" that people have at times, which in the female sex is called "a woman's intuition," and in the male is merely "foresight." However, there is no reason to believe that the pineal gland has any of these supernatural powers. Science-fiction stories have been written concerning the possible value of this gland.—EDITOR.)

The Static Machine

Editor, SCIENCE QUESTIONS AND ANSWERS:

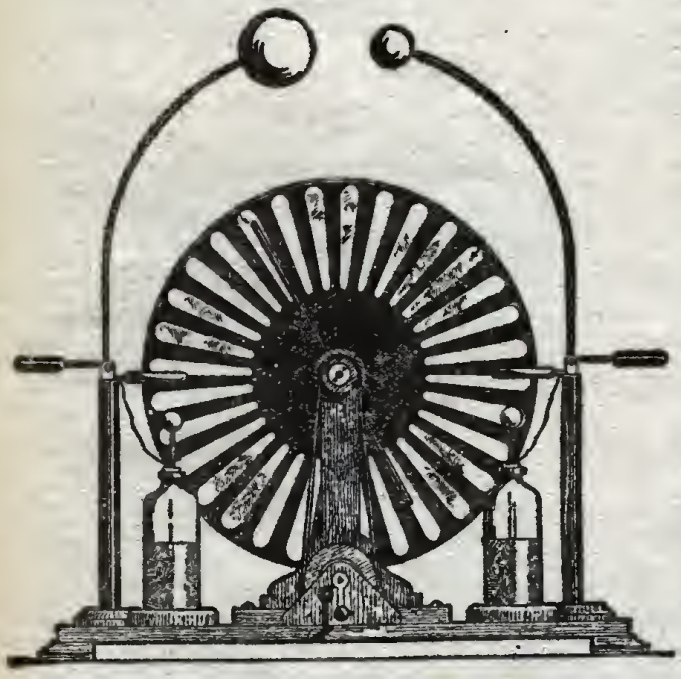
I find the "static" machine quite interesting, although I don't know what it is good for, or how it really works. Could you tell me a few things about it in your science department?

MARTIN MARKTHALER,
Elizabeth City, N. C.

(You will find an illustration of a typical static machine on this page, showing a front view of the instrument. This is a "Wimshurst" model.

The principle of the static machine is friction. Static electricity is caused by the rubbing together of any two dissimilar non-conductors. The rubbing throws negative electrons from one of the substances to the other, causing the material with the surplus electrons to have a negative charge and the object that is deficient in electrons to become positively charged. At one time, this was the only method of creating high-voltages. An ordinary static machine cannot cause death, however, no matter how great the charge accumulated, because there is no amperage.

There is no real value to the static machine. It is merely used for experimental value. A detailed construction article on how to build a static machine can be found in our sister publication, EVERYDAY SCIENCE AND MECHANICS, for June, 1934.—EDITOR.)



Turning the handle of this static machine, which is at the lower center section of the drawing, revolves the plates, causing friction. This friction produces a charge of static electricity which causes flashes of artificial lightning to snap between the two metal balls at the top of the construction.

The Death Ray

Editor, SCIENCE QUESTIONS AND ANSWERS:

Dr. Tesla, world-famous inventor, recently announced the invention of a ray so powerful in its destructive effect that it would render war impossible. Tiny, microscopic particles, probably dust, would be projected upward in a curtain miles high, at a terrific speed. Dr. Tesla estimates that 10,000 airplanes flying into one of these curtains would be completely destroyed. As usual, the newspapers garbled the facts, so I am asking the following questions.

(1) Tell me simply, but at some fair detail, the principles of this ray.

(2) Why couldn't one ray be installed upon a ship as a weapon? Dr. Tesla plans to set up the rays about the border of a country as a defensive measure. It ought to be effective as an offensive weapon also.

(3) What would happen if two of the destructive rays met and bombarded each other? What would happen if three or four, or any number of these rays, were to converge and meet at one common point?

PHILIP ALLISON TURNER,
Hiram, Ohio.

(As you say, the newspapers garbled the facts concerning Dr. Tesla's death ray, and most people actually think he has a working model in his laboratory. He only propounded a theory and provided ideas, and made no "invention" of a death ray. Death rays have been perfected to kill vermin, and it is not very fantastic to conceive of death rays that will kill the higher animals as easily, though for the sake of humanity, it would probably be better if none are ever discovered—at least the instant annihilators used in science-fiction stories. Long exposure to radium and other rays proves fatal, though this is still in the experimental stage. If and when these death rays are perfected, they could easily be installed on a ship as a weapon. Two or more meeting in space would probably not react upon each other, any more than two doses of arsenic would react upon being mixed.—EDITOR.)

The Fitzgerald Contraction

Editor, SCIENCE QUESTIONS AND ANSWERS:

I have read yours and several similar magazines for several years and I get a great deal of pleasure, not to speak of the scientific knowledge, from them.

While I frequently read the questions and answers in the back, I have probably missed the answer to a problem which I now request of you, please.

(1) An object (mass) traveling at the speed of light would have no linear dimension. (Fitzgerald Contraction).

(2) Mass moving (observed as light ray).

(3) Mass at sun had to have linear dimension.

(4) Why don't we find evidence of this mass, projecting from or covering objects not penetrated by light rays?

LEE R. COLLINS,
Seattle, Wash.

(In the first place, an object traveling at the speed of light would not appear as a light ray. From the front or rear, the object would appear normal, and it could not be seen at all from either side, there being no length to it while traveling at this speed.

You seem to have the idea that all light is made of moving mass, which is not so. The preceding paragraph shows this.—EDITOR.)

The Delta

Editor, SCIENCE QUESTIONS AND ANSWERS:

There are a lot of words in our language that I believe the general public takes for granted without knowing why a thing is called such-and-such. One of these words that has troubled me is "delta." Why is the point where the Mississippi River enters the Gulf of Mexico at New Orleans called a "delta"?

FRANK LAURENCE,
Vancouver, Canada.

(The word "delta" designates the fourth letter of the Greek alphabet, or what would correspond to our letter "d." The mouth of the Mississippi River is called a "delta" because its shape is like that of the fourth Greek letter, an upright triangle.—EDITOR.)

The SCIENCE FICTION LEAGUE

—a department conducted for members of the international SCIENCE FICTION LEAGUE in the interest of science-fiction and its promotion. We urge members to contribute any item of interest that they believe will be of value to the organization.

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WE have decided that those who have successfully passed the First Science Fiction Test, published in our last issue, will be designated as First Class Members, instead of Bachelors of Scientifiction. In place of Masters of Scientifiction, we shall have Ace Members. Our former Ace Members will hereby become Active Members. There will be no Doctor of Scientifiction degree. Those who have answered our questionnaire unsuccessfully will be added to our list of Active Members for their efforts. This organization will award no degrees.

SCIENCE-FICTION MOVIES

We want everyone, whether you are a member of the LEAGUE at present or not, to write immediately to E. C. Reynolds, if you have not already done so, Member Number 315, at 3235¼ Descanso Drive, Los Angeles, Calif., telling him that you will be eager to attend any science-fiction movies that are to be made by the Hollywood producers. You might also tell him which stories you think would make the best pictures. When Mr. Reynolds gets a list of about ten thousand names, he will present them to the film magnates to show that there is a big demand for fantastic pictures.

Speaking of science-fiction movies, you will notice a half-page important notice elsewhere in this issue calling the attention of our members and readers in the New York Metropolitan area to the fact that a local theater is willing to revive the old science-fiction movies of the past—such as "The Mysterious Island" and "Just Imagine," not to mention the foreign masterpieces like "By Rocket to the Moon" and "The End of the World." We want all of our members in or near New York to pay special attention to this notice and co-operate with us in showing the manager that we can secure enough people to fill the theater during these special shows. Tell your friends about it, too. If the plan works in New York, it will probably be tried in other great cities all over the country—and reviving science-fiction movies is one of the very best ways to spread science-fiction. This is a major step in the advancement of fantasy.

Forrest J. Ackerman, Honorary Member Number One, has co-operated with us by furnishing a complete list of all the science-fiction movies ever made.

THE ERIE CHAPTER

This is to announce that on October 29, 1934, the ERIE SCIENCE FICTION LEAGUE, Chapter Number Three, was formed and organized by Jack Schaller, the Director. Charter members include the following (member number follows name): James Cribhins (527), Richard Glenn (528), Edward Camilli (92), Robert Brosche (548), Paul Rosanski (547), and Jack Schaller (81).

The first meeting of this Chapter took place the first Wednesday in November. Members who wish to join this Chapter should address: ERIE SCIENCE FICTION LEAGUE, Jack Schaller, Director, 324 E. Fifth St., Erie, Pa.

THE LOS ANGELES CHAPTER

This is to announce that on November 13, 1934, the LOS ANGELES SCIENCE FICTION LEAGUE, Chapter Number Four, was formed and organized by E. C. Reynolds, the Director. Charter members include the following (member number follows name): William S. Hofford (285), Alfred H. Meyer (502), Donald H. Green (96), Alvan Mussen (371), John C. Rohde, Jr. (401), Roy Test, Jr. (417), and E. C. Reynolds (315).

The first meeting of this Chapter was held at 8:00 p. m. on October 27th, 1934, by Mr. Reynolds, the Director. All the members were present and two visitors, Edward Hightig and Jack Hogan. Mr. Meyer suggested that the next meeting be held on November 12th at 8:00 p. m. for the purpose of electing officers and drafting by-laws. The motion was seconded by Mr. Rohde and carried. The meeting was adjourned at 8:30 p. m. and followed by general discussion. The minutes were recorded by William S. Hofford, Acting Secretary.

Members who wish to join this Chapter should address: LOS ANGELES SCIENCE FICTION LEAGUE, E. C. Reynolds, Director, 3235¼ Descanso Dr., Los Angeles, Calif.

THE MONTICELLO CHAPTER

This is to announce that on November 13, 1934, the MONTICELLO SCIENCE FICTION LEAGUE, Chapter Number Five, was formed and organized by William Rothleder, the Director. Charter members include the following (member number follows name): Walter Scheible (544), David A. Kyle (359), Charles Kaufman (593), Bernard Kaufman (594), Isreal Ellenberg (595), Abraham Wolf (596) and William Rothleder (82).

David A. Kyle, the Secretary, states that other members are forthcoming, and that buttons and all official stationery will be purchased by the dues that the members will pay. The Chapter has met a number of times already and the primary business was discussed. "Running as smoothly as could be expected, we, through myself," states the Secretary, "shall send you the minutes of every meeting. We assemble Sundays at five o'clock in the offices of my father. We hope to make this Chapter worthy of the SCIENCE FICTION LEAGUE."

Members who wish to join this Chapter should address: MONTICELLO SCIENCE FICTION LEAGUE, David A. Kyle, Secretary, 22 Cottage St., Monticello, N. Y.

THE MAYFIELD CHAPTER

This is to announce that on November 15, 1934, the MAYFIELD SCIENCE FICTION LEAGUE, Chapter Number Six, was formed and organized by John Tomczyk, the Director. Charter members include the following (member number follows name): Anthony Kasheta (388), Anthony Champe (505), George Fife (391), Robert Weir (506), George Tomczyk (390), John Kulkosky (389), and John Tomczyk (161).

Members who wish to join this Chapter should address: MAYFIELD SCIENCE FICTION LEAGUE, John Tomczyk, Director, 637 May St., Box 272, Mayfield, Pa.

THE LEWISTON CHAPTER

Following are the minutes of the second meeting held by the LEWISTON SCIENCE FICTION LEAGUE, Chapter Number Two, submitted by the Secretary, Dwight Edwards.

"All the members were present. We had a speech from Director Ayers who stressed the point that we should all endeavor to help the LEAGUE. Some of the things he suggested were: each of us try to have editorials on science-fiction printed in our newspapers, each try to obtain at least one new member, and to be on the lookout continually for a vacant hall, schoolroom, or some such place where we could attend future meetings.

"We then talked on different phases of science-fiction—science, science-fiction authors, prospective members, etc.

"Since the LEAGUE was formed, we have been on the spy for members. We have loaned magazines and books to potential members and several may become members any time.

"Someone suggested lending our back issues to any member of the LEAGUE, and it was agreed upon by all.

"We agreed there would be, as yet, no set time for meetings, but we would have them whenever the Director stated, and when it was within our means to attend."

Members who wish to join this Chapter should address: LEWISTON SCIENCE FICTION LEAGUE, Stuart Ayers, Director, 1411 Tenth Ave., Lewiston, Idaho.

THE BROOKLYN CHAPTER

We urge all of our members in Brooklyn to join Chapter Number One. If you are interested, write to: BROOKLYN SCIENCE FICTION LEAGUE, George Gordon Clark, Director, 8709 Fifteenth Ave., Brooklyn, N. Y.

PROPOSED CHAPTERS

Here is this month's list of volunteers for the directorship of local Chapters of the LEAGUE:

WASHINGTON SCIENCE FICTION LEAGUE (Proposed). T. J. Mead, 1819 G St., N. W., Washington, D. C.

JERSEY CITY SCIENCE FICTION LEAGUE (Proposed). Theodore Lutwiniak, 172 Pavonia Ave., Jersey City, N. J.

MOLINE SCIENCE FICTION LEAGUE (Proposed). Carl R. Canterbury, 1527 Eleventh Ave., Moline, Ill.

DES MOINES SCIENCE FICTION LEAGUE (Proposed). Vernon H. Jones, 1806 Sixth Ave., Des Moines, Iowa.

DENVER SCIENCE FICTION LEAGUE (Proposed). Olon F. Wiggins, 2418 Stout St., Denver, Colo.

LIVERPOOL SCIENCE FICTION LEAGUE (Proposed). Leslie F. Johnson, 46, Mill Lane, Old Swan, Liverpool 13, England.

INDIANAPOLIS SCIENCE FICTION LEAGUE (Proposed). Henry Hasse, 1236 Wade St., Indianapolis, Ind.

CENTRAL TEXAS SCIENCE FICTION LEAGUE (Proposed). Alvin Earl Perry, Box 265, Rockdale, Texas.

SHANGHAI SCIENCE FICTION LEAGUE (Proposed). A. V. Bleidan, 208 Avenue du Roi Albert, Shanghai, China.

PHILIPPINE SCIENCE FICTION LEAGUE (Proposed). J. R. Ayco, Bacolod, Neg. Occ., Philippine Islands.

PHILADELPHIA SCIENCE FICTION LEAGUE (Proposed). Milton A. Rothman, 2500 North Fifth St., Philadelphia, Penn.

SACRAMENTO SCIENCE FICTION LEAGUE (Proposed). Arthur Jones, Jr., 2717 Santa Clara Way, Sacramento, Calif.

BUFFALO SCIENCE FICTION LEAGUE (Proposed). Leo Rogers, 616 Jefferson Ave., Buffalo, N. Y.

STATEN ISLAND SCIENCE FICTION LEAGUE (Proposed). Rudolph Centsch, 50 Holly St., Dongan Hills, Staten Island, N. Y.

ST. LOUIS SCIENCE FICTION LEAGUE (Proposed). Harold Rice, 4129 Washington Blvd., St. Louis, Mo.

MANCELONA SCIENCE FICTION LEAGUE (Proposed). Arthur Green, Mancelona, Mich.

BRONX SCIENCE FICTION LEAGUE (Proposed). Julius Morris, 1416 Croes Ave., Bronx, N. Y.

DANVILLE SCIENCE FICTION LEAGUE (Proposed). Robert H. Anglin, 252 Jefferson Ave., Danville, Va.

CHICAGO SCIENCE FICTION LEAGUE (Proposed). William H. Dellenback, 732 Burton Court, University of Chicago, Chicago, Ill.

OAHU SCIENCE FICTION LEAGUE (Proposed). Birney Montcalm, Army and Navy Y.M.C.A., Honolulu, T. H.

MILWAUKEE SCIENCE FICTION LEAGUE (Proposed). Raymond A. Palmer, 1406 W. Washington St., Milwaukee, Wis.

LEBANON SCIENCE FICTION LEAGUE (Proposed). LeRoy Christian Bashore, 810 N. Seventh St., Lebanon, Pa.

LINCOLN SCIENCE FICTION LEAGUE (Proposed). P. H. Thomson, 6347 Lexington Ave., Lincoln, Neb.

CORN BELT SCIENCE FICTION LEAGUE (Proposed). Bob Tucker, 210 E. Grove St., Bloomington, Ill.

When a reader would like to become a part of any Chapter, he must first join the parent body, then send in his name and address to the Director (the one who wishes to form the Chapter he wants to join). Such person should live in the district in which the Chapter is located so that he can attend meetings.

If you wish to form a Chapter, let us know, and we will publish the fact. When you have a number of names on your list of those who want to join the local Chapter (wait at least three weeks or a month for these after the issue appears containing your name) send the list to us and, providing all the names are entered as members at Headquarters, the local Chapter will be declared. Do not apply to start a Chapter in any city mentioned already in these lists. One Chapter in each city (except Greater New York) will be enough to start with. Later on, more will be organized when demand warrants it.

We will give your Chapter an official name and number. From then on, the name and address of your Chapter will be printed in every issue of WONDER STORIES, so that those who become members of the SCIENCE FICTION LEAGUE from time to time, who live in your neighborhood, may join, increasing the size of the Chapter. Dues or fees of any kind *may* be charged within local Chapters, in order to carry on special activities, only upon the agreement of all the members. Those members who do not wish to contribute, will not be expelled from either the Chapter or the LEAGUE by not doing so. In other words, all contributions must be voluntary, though a specific amount may be decided upon. This will be done only within local Chapters—there will be no dues or fees of any kind conducted by the LEAGUE Headquarters. Treasuries accumulated by this method may be used to issue pamphlets, hire halls or lecture rooms, or any other reasonable thing that the Director and local members see fit to use it for. This also includes outings, parties, etc. The Director or his appointee will be the presiding officer at each meeting. Assistant Director, Secretary, and Treasurer may also be elected by the local members. However, accurate minutes must be kept, a duplicate of which will be sent to Headquarters directly after they have been approved at the next meeting. Important activities recorded in the minutes will be discussed in this department, which will be the voice of the LEAGUE and all its Chapters. Meetings may be held at any frequency, everything to be decided by the local members. All helpful suggestions made by members during any meeting will, of course, be recorded in the minutes and therefore prove of value to other Chapters. There is to be no competition between Chapters—they are to co-operate, and perhaps, after a while, we will have a grand convention somewhere with delegates from the various Chapters. Would you like to be a Director of a local Chapter of the LEAGUE? There will be very little responsibility on your part, and it is not hard to find a meeting place. If you can't start off with a lecture room or hall, or one of the members' homes, then you can meet in the nearest public park until the Chapter is larger and can afford something better.

SCIENCE FICTION PLAYS

Through Forrest J. Ackerman, we have learned that Joe Kucera of Omaha, Neb., has a plan to help the SCIENCE FICTION LEAGUE. He writes as follows:

"I have been reading reports on the SFL and have noticed the wild clamor for science-fiction radio broadcasts. The members seem to crave science-fiction plays like nothing else. Here is where the KST studios of Omaha come in. My colleague, a Byron Tharp, and I have been working for months on our own recording apparatus, for recording sound on the flexible Victor Home Recording Disc. Our sound, however, has more brilliancy and clarity, as well as a wider range of frequency response, than that recorded by the RCA Victor home recording radio-phonograph . . . .

"We are willing, in order to satisfy many members of the SFL, to record one-hour plays, dealing with science-fiction, to be lent to some of the largest SFL groups in the country. These plays will consist of eight discs of seven and one-half minutes each."

We have written to Mr. Kucera for more details, and it looks as though, through his co-operation, we may soon have the favorite science-fiction stories on phonograph discs for the enjoyment of the local Chapters of the LEAGUE. More details will appear in this department as the plan develops.

A BUDDING CHAPTER IN GERMANY

Walter Koch of Germany, Member Number 562 of the SFL, writes to us as follows:

"I did not have the opportunity as yet to have any of my friends join the LEAGUE, but I shall get right down to work when my English Circle starts again on November 6th. Just now I am busily translating the LEAGUE pamphlet into German, so as to enable those who do not master the English language to get acquainted with the rules and purposes of the LEAGUE.

"I have also been doing my very best to obtain German magazines similar to WONDER STORIES, but all my efforts have been in vain. I shall simply have to translate some of the best stories which have been published in WONDER STORIES into German or perhaps write some stories myself. This will mean a good deal of work for me to do, but the purpose of the LEAGUE is worth it, I'm sure.

"I am not quite ready to direct a local Chapter of the LEAGUE yet, but I shall in three or four weeks, though. I shall let you know about it then. If all members of my English Circle consent, I shall no longer let the name of the club be English Conversational Circle, but change it to the DUSSELDORF SCIENCE FICTION LEAGUE. The club has about fifteen members now."

We certainly appreciate the efforts of Mr. Koch in translating our science-fiction and information for those of his friends who do not speak English and forming a local Chapter of the LEAGUE from his English Conversational Circle.

A NOVEL IDEA

LeRoy Christian Basbore, volunteer Director for a local Chapter of the LEAGUE in Lebanon, Pa., and member Number 567, states that he has put a sign up in front of his house announcing his connections with the SCIENCE FICTION LEAGUE in order to attract new members and he intends to write articles on science-fiction and the LEAGUE for newspapers.

NOTICE TO DIRECTORS

We want to call to the attention of volunteer Chapter directors the fact that it does not take a great many members to form a local Chapter. Because we believe that it is relatively easy to secure new members after the Chapter is formed, we will authorize a Chapter with only three members to start. If you are a Director and only a few have written to you, offering to join your Chapter, send us the list now and we will declare the existence of your Chapter, or you can secure a list of members in your locality from Headquarters, and solicit each one, either by mail or personal call. This will eventually bind together all the lovers of science-fiction in your neighborhood into one group. Why work alone? Get together! Remember, three members are enough to start a Chapter, and you will find it much easier to secure new members after the Chapter is organized.

BOOK DISCOUNTS

Several members have written in asking how they can secure the discounts on science-fiction books that we said publishers will allow, when the LEAGUE was formed. All you have to do to get these discounts is write to the book publisher, ordering the book (which must be science-fiction) and ask for the discount which you are entitled to as a member of the LEAGUE. Most publishers will heed your request.

YOUR CERTIFICATE

To date, several members have not claimed their certificates, although their applications have been received and approved. The certificate is given

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Application for Membership

SCIENCE FICTION LEAGUE

I, THE UNDERSIGNED, herewith desire to apply for membership in the SCIENCE FICTION LEAGUE. I have read the rules of the LEAGUE, and hereby pledge myself to abide by all the rules and regulations of the SCIENCE FICTION LEAGUE. Enclosed find fifteen cents (15c) to cover the mailing and handling charges for this certificate.

Name .....

Address .....

City and State .....

Country .....

Date .....

(It is important the reverse of this blank be filled out. No application valid without.)

free to all those who find it possible to call at Headquarters for it. However, when it has to be mailed, a mailing and handling cost of fifteen cents is charged. We urge you to send in your fifteen cents if you cannot call for your certificate. You will find it necessary to have a certificate in order to enter any Chapter, and for other times when identification is necessary.

PAMPHLET OF INFORMATION

We have prepared a four-page leaflet adopted from our editorial in the May, 1934 issue of WONDER STORIES, which outlines the rules and purposes of the LEAGUE, with an application. These will be provided free of charge to those who wish to join and have not already done so, or to members who want to convert others. Please send a stamp to cover mailing cost.

ACTIVE SERVICE

We have received the following suggestions from David A. Kyle of Monticello, N. Y., Member Number 859:

"I have influenced a number of persons to join the SFL. They are interested in science-fiction, but they are not enthusiastic enough to take an expeditious part. Evidently, when one enrolls as a member, he is a member for life. Therefore, there is no distinctiou between a person who after a while forgets his membership and one who is always wide awake. It is my suggestion that you draw a line, so to speak. In other words, everyone enrolled is now a life member, but a year after his enrollment, he must enroll again to become an *active member*, otherwise he would just be an ordinary one. They need only to submit their application for the active membership and they will receive a slip which states so. An active member shows that he is always on the go. This is very essential as I see it, for there is really a classification from a slacker and a true scientifictionist. What is the verdict?

"Still another. After five years of service as an active member, a pin is awarded, for a small cost, which is just the same as the regulation one that is in use now, the difference being that it is smaller and is superimposed upon a Roman numeral five. This could also be the same for ten years, only with the Roman numeral ten. Once again there is something to which we can look forward. Also, after every year of *active* service, your certificate should be sent to the Headquarters, with return postage enclosed, where a tiny star or miniature design of the insignia could be stamped upon it and thus denote your service record. That's all for the present."

Now, we don't see how enrolling each year, as you suggest, merely by sending an application to Headquarters, would denote the member to be *active*, and always on the go. You will notice that we elect our most valuable members as *Active Members*, and they really must do something to secure this honor, not merely re-enroll each year. This *really* denotes active membership. To become an *Active Member* you must place an editorial, article, or letter in some newspaper about science-fiction in general or the SCIENCE FICTION LEAGUE in particular—something that will make others take notice and want to see what it is all about—or, you must do something that Headquarters considers of equal value, such as providing Headquarters with a valuable idea to advance the LEAGUE. For example, Alvin Earl Perry is now an *Active Member* for suggesting the science-fiction test. If you believe that you have done something deserving of this distinction, you must send your proof to Headquarters and request permission to call yourself an *Active Member*. If Headquarters considers your act of sufficient merit, a letter will be sent you declaring that you are an *Active Member* and may so call yourself in the future.

A COMBINE

Forrest J. Ackerman, who well deserves being an Executive Director in the LEAGUE, has informed us that Patrick Enever of Middlesex, England, Secretary of the British Science Fiction Association, is anxious to make the BSFA a local Chapter of the SCIENCE FICTION LEAGUE. We have written Mr. Enever, offering him the Directorship of the BRITISH SCIENCE FICTION LEAGUE and sending him enough application blanks to enroll all of his members. His group will retain its old identity as well as acquire the new and it hopes to be one of the leading science-fiction groups in the world. Membership in this prominent Chapter will probably be open to all of our members in Middlesex by the time of our next issue.

Forrest J. Ackerman has helped us out in this matter, also with our science-fiction movie revivals for our New York readers and members, with the future production of science-fiction plays on phonograph records, and has done many other things for the advancement of the LEAGUE too numerous to mention. Well known as the country's leading science-fiction fan, it is about time that we distinguish him with *Active Membership*. Therefore, he has become *Active Member* number seven. Other *Active Members* to date, those who have done really remarkable things, are Stuart Ayers, John S. Shounder, Alvin Earl Perry, Thos. S. Gardner, Jack Schaller, and Theodore Lutwinlak.

(Continued on page 1145)

(REVERSE SIDE)

I consider myself belonging to the following class: (Put X in correct square.)

Professional
(State which, such as doctor, lawyer, etc.) ☐ .....

Business (State what business) ☐ .....

Author ☐ .....

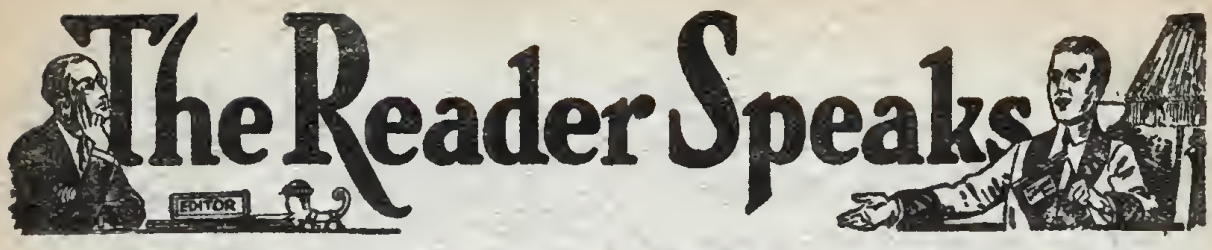
Student ☐ .....

..... ☐ .....

Age.....

Remarks:.....

.....



IN this department we shall publish every month your opinions. After all, this is your magazine and it is edited for you. If we fall down on the choice of our stories, or if the editorial board slips up occasionally, it is up to you to voice your opinion. It makes no difference whether your letter is complimentary, critical, or whether it contains a good, old-fashioned brickbat. All are equally welcome. All of your letters, as much as space will allow, will be published here for the benefit of all. Due to the large influx of mail, no communications to this department are answered individually unless 25c in stamps, to cover time and postage, is remitted.

Ideas About "Science Fiction"

Editor, WONDER STORIES:

This should develop as an essay treating the definition of "science fiction" and in the consequences as an attempt to explain the—in my opinion—immense popularity of WONDER STORIES above the other magazines working on the same or similar lines.

The strictly etymological meaning of the term "science fiction" denotes stories which did not happen in reality, therefore being fictitious, and besides possessing some scientific relations. In fact, some editors accept a bit too readily this interpretation and print stories which fulfil both conditions, but which nevertheless do not receive the praise of the readers. Imagine for instance a story relating the adventures of a couple of racketeers making use of a short wave transmitter to send their messages and a private sleuth of a radio engineer tapping their secret beam. For all intents and purposes, there is a science fiction novel, which at the same time is not one. By this time you'll see my objective and *what* I am driving at! Obviously, the etymologically not burdened reader simply listens to his feelings and common sense when he declares that a story can be called science fiction. To analyze these feelings is not quite so easy. There seems to underlie a craving for the phantastical in the reader's mind. *The science in the novel should be developed above its present standing, at the same time preserving the already known facts as a basis.* This explains those slogans: "Prophetic Fiction is the Mother of Scientific Fact," or the like. The unexpected turn in the story's action should furthermore come from the scientific aspects if possible, and not from any other side. And then there are a couple of other claims, which are very difficult to be put in exact words. In conquering these difficulties on the side of the editor lies the secret of success. In other words, the editor should adapt himself to the mind of the reader and not simply accept a story because it is science and it is fiction.

And all this settles at once that much-abused question of reprints so often raised in the correspondence columns of the science fiction magazines. Reprints are, of course, the revival of older stories, where very often the science, which at the time of writing was phantastical and new, is already surpassed at the time of publishing the story as a reprint. Jules Verne's "20,000 Leagues Under the Sea," for instance, cannot be considered today as a science fiction story. We know submarines very well in our days, so this idea cannot convey a thrill for us. Other "scientific" facts related in this novel have been proven utterly impossible in the meantime, and besides the ancient verbose style of writing—while stylistically above all reproach—is slow in tempo and dragging in its expressions. Descriptions of surroundings a.s.o. have the precedence above action parts, and the general flavor of the whole is strangely out of date. As the science is very often already realized, the magazine bearing such novels could easily change its name to "Ancient Science Stories," for instance.

Then where is the cause that some science fiction magazines print such stories nevertheless? Besides taking in consideration the lower costs for publishing the old stories, I think the editors of these magazines are, somewhere at the bottom of their hearts, a little afraid of their own boldness to edit a phantastical magazine and at the same time they are very eager to have an irresistible alibi for their literary efforts. So they bring time and again some of the so-called "classics." If anybody arises from the readers and tries to stamp the magazine as "trash," *presto,* the editors point boldly to their "classics" and tell you that they are always anxious to preserve their high literary standard, and that a magazine bringing novels from acknowledged and well-known classical authors from all over the world cannot be considered "trash." But in my opinion, an editor must have faith in his modern contributors and be able to hold his standard by these alone. There is always a possibility that *they* will be regarded in the future as the classics, and anyway, you cannot very well contradict this assumption, lacking so much needed "critical distance," which is essential in most cases of criticism. This accounts for the fact that most authors were misunderstood by their contemporaries and their real value was only acknowledged at later periods. (This is where the intuition of a good editor comes into play in the choice of modern good authors and their outstanding novels.) This fear on the part of the editors results in less flashing cover illustrations, careful selection of not too *radical* stories, a certain restraint in editorial comments of readers' letters, and a beating around the bush concerning the editor's opinion of future science developments. In spite of the fact that the magazine appears to deal on modern lines, there is a lurking obsoleteness to be felt between the lines!

Of course, there is a difference between reprints and reprints. The novels of some modern authors can be reprinted if they are for instance out of print and the readers clamor for them. However, these are exceptions and should be considered as such. Most "modern classics" works—already printed somewhere—are readily obtainable and there is seldom need for a reprint. The works of the "old classics" are always available, if not otherwise, then second-hand. As a last argument, I may mention that the veteran science fiction fan, finding a known novel in his newly bought magazine, feels himself irrevocably cheated out of his money's worth, receiving partly stuff which he has read repeatedly.

Now, to come down to brass tacks! I feel that Mr. Gernsback has most luckily eliminated all these discrepancies in his editorial lines. He seems to understand his readers, and this all the more because he is himself an ardent science fiction fan and a most broadminded and scientifically trained personality. He does not fear undue—and not even unuttered, secret—criticism as long as he is convinced of his right; his thinking is up to date and he anticipates—better than he knows—the demands of his readers. In short, he possesses the so-much-needed editorial self-confidence. I have no statistical data about the circulation of WONDER STORIES or any other American science fiction magazines, but I should not be mistaken to put the circulation of W.S. high above its competitors.

Much luck to you, and above all, stick to your standards!

ANDREW LENARD,
Budapest, Hungary.

(Your statements concerning the reprint question and the real meaning of the term "science fiction" have always been our views and we are glad to see them brought out so clearly by one of our readers. We have always said that science fiction is more than

just a combination of science and fiction—it contains the added ingredient called "fantasy."

We like to start this department off with some interesting and thorough discussion such as your letters have always been.—*EDITOR.*)

Phifty Phavorite Phrases

Editor, WONDER STORIES:

We do *not* want reprints. We wish to commend WONDER STORIES on its stand against them. The old recognized science-fiction classics were of course the best ever written and will never be equalled; but to reprint them would make it too easy. Half the enjoyment comes from the thrill of "running them down" and adding them to your library. We think the Editor will agree that this is so.

We're sorry we had to commend WONDER STORIES in the very first paragraph. So to shatter the Editor's blithe thoughts, we will say that practically the only reason we buy the magazine any more is because we can always get some laughs out of "The Reader Shrieks." In the August issue the letter by Mr. Crowder was very well written and displayed much thought. Only one thing puzzles us—what did he mean by "VOX POX"? We have heard of chicken pox, small pox, pick-pox, and the corner mail pox—but never "vox pox." Possibly it is a new beer, there are so many brands on the market.

And now we know why you use that title for your magazine. Of course! It makes one wonder. After finishing the last issue, we wonder why we read it!

Dear Editor: Enclosed try to find 25c in stamps. Please send the May, 1929, issue of SCIENCE WONDER STORIES. We believe it superior to anything you have ever published. [And you know very well that the June, 1929, issue was our first number! More sarcasm! Hummph!—EDITOR.]

We see that Gernsback (good ol' Gernsback!) has had another of his bright ideas. "Original illustrations by the world-famous Paul, $5 and $15 apiece." Good gravy! That's the last straw! Who'n'ell wants to pay $15 for one of those Paul hallucinations—an enlarged one, at that! Isn't it enough that we have to endure him in and on WONDER STORIES? Have you any fourth dimensions for sale? We need one to complete our collection.

Now, Hornig, we don't know whether it was your idea or Gernsback's. We won't even say you're a liar. We'll just say that you exaggerated things a trifle. It may even be possible that the exaggeration was unintentional; we'll grant you that, too. But that gigantic blurb in the October issue entitled "Don't Be Fooled" bespoke of the utmost idiocy, and we think you will have realized that by now. There will be plenty of other readers who have their say, so we won't add to it, except to mention that the title "Don't Be Fooled" was an appropriate one inasmuch as you didn't succeed in fooling anyone. For our special benefit, will you tell us who did the "actual word counting" for WONDER STORIES?

We won't go into paragraphs and paroxysms about the stories, except to say that a couple more by Clark Ashton Smith will just about finish our Unabridged Dictionary, as it's about to fall apart now.

Phifty Phavorite Phrases of Letter Writers:

1. Although I am only 11 years old, I feel justified in writing to you as I have been reading your magazine for 7 years. (Wot is this!!?)
2. The latest issue was perfect. (This will do until the next issue comes out.)
3. The latest issue was lousy. (Ditto-ditto.)
4. Your stories are great.
5. Your stories are rotten.
6. I believe yore letter department is a fake. I dare you to print this.
7. As I have taken three lessons from a school of cartooning I feel fully capable of criticizing your covers.
8. Say, just what is this story, "The Lunar Puddle," that your readers praise so much?
9. Your magazine is a great cure for insomnia. I read it in bed but I go to sleep and leave the light burning and this is tough on the light bill. (He probably doesn't mean that it's tough on the light bill . . . .)
10. Trim the edges.
11. Don't you dare to trim the edges.
12. We want reprints!
13. We don't want reprints!
14. We do too want reprints!
15. Why is an author?
16. Where is an author?

(For numbers 17 to 50, see the last three issues of WONDER STORIES. Or the next three.)

Phifty Phavorite Phrases of the Editor:

1. We are always pleased to receive such intelligent comments from one so young.
2. There is little we can say in answer to your letter. You have covered the ground very thoroughly.
3. We are making a drive for new and original plots.
4. A close comparison will show this difference as to the amount of reading matter between W. S. and magazine B. (It did!)
5. We wonder what Mr. Kicker thinks now? As we said in answer to his letter, our loyal readers will come to the rescue. And they have.
6. Strange, but every reader who has found some fault with W. S. has later come back to the fold, admitting his mistake.
7. Our authors must eat, so we hesitate to use reprints.
8. We are giving the reprint question our serious consideration.
9. We will have something of interest in the near future about the reprint question.
10. We will not use reprints.
11. There will be a reprint Quarterly next month.

(And so on, far into the night.)

G'hye now.

HENRY HASSE,
HOWARD BILBIE,
Indianapolis, Ind.

P. S. Don't say it, Hornig; we know it by heart.

(Here is a strange, strange missile—or missive, rather—the likes of which it has never been our fortune to receive before. We really don't know what to make of it. Perhaps if Mr. Hasse, the co-author of those stupendously colossal "Tyme" stories that we printed, sent in this letter as a story, it might have had a chance, but then again, its story is a rather distorted and inconsistent one. He seems to pat us on the back and trip us at the same time. Here is one of the Mysteries of Life.

Yours is among the most amusing letters we have ever received, if not *the* most. Could we call it a burlesque on science-fiction letters, just as the "Tyme" stories were burlesques on science-fiction.

In your Phifty Phavorite Phrases we phear that you phorced some phacts to phit your argument, but it's a good pharce.

We could say a lot of things about your letter, but you state in your P. S. that you know it by heart, so we won't go to the trouble.—*EDITOR.*)

From SFL Member No. 18

Editor, WONDER STORIES:

The November cover was excellent. Paul is great. Nuf sed.

The editorial was very good. Gernsback certainly possesses sound reasoning.

From what I have heard, "Dawn to Dusk" is certainly going to go over big. It promises to be one of Binder's best stories, and that is saying plenty. Paul's drawing here was excellent.

"The Control Drug" was very good. Benson wrote a nice story.

"Valley of Dreams" was excellent. It had, as was stated, a lighter vein throughout the story. But there were some actually serious spots, which gave the author a place to express his opinions. More from Mr. Weinbaum, please.

"One Prehistoric Night" was excellent. This story was vividly and realistically told. Stories of the dim past, where one opinion is just as good as the rest, are always worth the trouble of reading. This author seems to know his "onions." I expect to hear more from him.

"The Growth Promoter" was good. Of course, and by all means, continue printing a short-short in every issue.

"Twenty-Five Centuries Late" was excellent. I especially liked this one. The story was well written. Future stories always seem to hold interest with me.

Well, the SCIENCE FICTION LEAGUE certainly seems to be growing. I am doing my part, for I have just recently converted a scientific chap to the LEAGUE. More may follow.

And did I get the surprise of my life lately. I discovered that one of the teachers in the building writes science fiction! Who is he? Guess.

RAYMOND PEEL MARIELLA,
Philadelphia, Pa.

(Your co-operation in the SCIENCE FICTION LEAGUE is greatly appreciated at Headquarters, and converting others, which you are doing, is the most helpful work you can do for the advancement of science fiction. Your enthusiasm is also shown in the fact that you are one of our very first members, Number 18.

We give up. Who is the teacher in yonr school who writes science fiction? We have many aspiring authors in Philadelphia and cannot guess the one you mean. We hope that you tell us who he is in your next letter.—*EDITOR.)*

The July Issue

Editor, WONDER STORIES:

In the July WONDER STORIES, "A Martian Odyssey" was just what you said it would he in your note. I would like to see a series written hy Weinbaum. He writes with an original, realistic conception. I like him better than S. P. Wright.

"Voice of Atlantis" was not as entertaining as Manning's former Stranger Club tales. But it *was* beautiful—worth re-reading. I suppose I didn't care for it as much because it was rather calm and passive clear through. It takes a good deal more concentration to read a story like that, and get the *best* from it.

"The Last Shrine" was charming, different, and very well written. I like tales of bizarre sciences.

All WONDER STORIES authors are plainly doing their best work. And now that they have all begun with vigor and insight, they won't fail or drop out.

I hate to ask this, but as we have no quarterly or annual *as yet,* would circumstances permit a few illustrations more for the longer stories? Many illustrations leave more to remember, and brighten the story. Anyway, I promise to buy the old magazine, even if there isn't a picture in it—and if you have to pick ink out of each looped letter with a pin in order to read.

I wish you all desired snccess.

STUART AYERS,
Lewiston, Idaho.

P. S. Persuade Ray Cummings to write us a story.

(Only an author with the ability of Laurence Manning conld write a tale like "Voice of Atlantis," lacking action, and still hold the reader's attention.

We don't want to crowd the book with illustrations. We feel that one is enough for each story. Too many of them take the room that rightfully belongs to the fiction.—*EDITOR.)*

The Ackerman Limited

Editor, WONDER STORIES:

I think that the October and November covers have been superiative.

A better-than-average story hy haif a point, "The Thieves From Isot." I considered it the best story of the October issue. Whilst "The Finai Struggle" unfortunately impressed me as being very bad as a science-fictional, fantastic, or any kind of story. In other words, The Emotion Meter (credit, W. Varick Nevins III) registered it in the zero-zone.

Excellent are the fictional contents of the November number, with good illustrations by both Mr. Paul and Winter, to match. Serial, "The Fall of the Eiffel Tower," I found throughout too slow, though occasional parts were of good interest. The ending was good, if not idealistically satisfying. But—to the complete stories of the issue: every one deserves a good mention to its author. "The Control Drug" was good; "One Prehistoric Night" and "Twenty-Five Centuries Late," a little better, and of even merit; and "The Growth Promoter" and "Valley of Dreams" I considered the star stories of the issue, both splendid. Mr. Weinbaum has an excellent imagination, and did not disappoint me with the sequel to his "Martian Odyssey." From the way "The Growth Promoter" satisfied me, I think I can say of the author that in the stf. short-short story line, Chapple surely goes far! I hope he writes fnrther.

In closing—ahout this astonishing (say incredible) Hoy Ping Pong article you have puhlished in the November issue . . . . Heavens and earth, I never read such a thing!

"Sing a song of Ping Pong,
Convention Chronicler.
He writes of League events to come
—And, my! such things occur!"

I can't believe any descendant of Forrest Ackerman ever used SFL money (and, anyway, the SFL doesn't bave any money) for ice cream sodas, as carbonated water has always been distinctly irritating to the Forrest Ackerman tongue.

. . . . And a special, crack Limited for Ackermanville! Og-og. It is impossible to comment on the complete "affair" in detail, but thank heavens that sort of thing is *limited!* if you get what I mean . . . .

FORREST J. ACKERMAN,
Exec. Dir. SFL.
San Francisco, Calif.

(The science-fiction awards are getting well under way now, with the publication of the science-fiction test to be taken by those who wish first-class membership, along with joining some local Chapter of the SCIENCE FICTION LEAGUE.

This is the first time that we knew you were a poet.

Evidently, Mr. Pong believes that science-fiction runs in the Ackerman hlood, and we hope that it does—and that it isn't *limited,* if you get what *we* mean! —*EDITOR.)*

From Mr. Faithfully

Editor, WONDER STORIES:

With each succeeding issue, WONDER STORIES seems to leap forward to a new standard of magnificence. One of these fine days it will be almost too good to puhlish. In my opinion science-fiction forms the most enthrailing part of literature published today.

And now, dear Editor, you must not lose your hold on the following:

Paul—undouhtedly the finest artist yon have. He must have one of the most astounding imaginations in all America.

Laurence Manning—a genius for original plots. "The Man Who Awoke" series was the finest piece of work any science-fiction author ever penned.

Dr. Keller—another genius who is excellent at portraying the human side in his stories.

Richard Vaughan—just because he wrote that epic, "The Exile of the Skies."

Of course there are others, but what's the use of filling up space. Everyone knows them—and likes them.

And now to be nasty—never fear, I am not referring to you, my dear Editor—it would give me the greatest pleasure to "hump off" Miss M. Pepera for her letter about her bad intentions toward Laurence Manning. The same for Donald A. Wollheim, the *cur,* for using so much space in "The Reader Speaks" just to revile the mag in such a disgusting manner. There seems to be no cure for these discontented pups who deign to buy WONDER STORIES monthly and then literally tear each issue to pieces with destructive criticism.

Lastly, "Druso" was a *super* story. Most of the German science-fiction you have published has been excellent. I do not care for the French ones you import. However . . . .

Good luck, and long live WONDER STORIES.

YOURS FAITHFULLY,
Glasgow, Scotland.

(We almost hesitate to print what yon have to say about Mr. Wollheim, but we guess that'll hold him! We print letters of all kinds, though we do not necessarily have to agree with the writers' views. And as for Miss Pepera, we hope you never meet her in a dark alley while you are carrying a lead pipe, or something. After all, if science-fiction fans are going to start murdering each other, science-fiction can't get on very far by losing followers, so we hope you'll reconsider your evil intentions.

Evidently, you forgot to sign your name to your letter.—*EDITOR.)*

A Secondary Education

Editor, WONDER STORIES:

I have not written to WONDER STORIES since early this year, so this letter will probably be of some length. I have just received the June issue and I was pleasantly surprised to find my letter in the Readers' pages. I hope this one pursues a parallel course.

In my opinion, WONDER STORIES is still the best science-fiction magazine, but it owes its supremacy over the others to two things. The chief one is the "Science Questions and Answers," and the other is

the brilliant illustrations by Paul. My mind is definitely made up now. Paul is the best artist. I admit he cannot draw humans, but he can do science-fiction illustrations. Surely an artist who illustrates your magazine should aim primarily at capturing the spirit of science-fiction in his pictures. This Paul does admirably, but this the rest of your illustrators cannot do. Winter is fine for drawing humans, but neither he nor any other artist is a patch on Paul for drawing real science-fiction illustrations. The February and May covers support this remarkably, especially the May. They are superb. Of the inside illustrations of Paul. I believe those illustrating "When Reptiles Ruled," "The Menace from Space," and "Xandulu," are among the finest that he has ever done.

I will divide the major stories in the January to May issues into four groups:—Outstandingly good, good, fair, and poor. I may say that there are few of the last group.

Outstandingly Good:

"The Exile of the Skies," "The Sublime Vigil," "The Brain-Eaters of Pluto," "Caverns of Horror," "The Literary Corkscrew," "The Land of Mighty Insects," and "Druso."

Good:

"Today's Yesterday," "The Spore Doom," "The Vengeance of a Scientist," "Martian Madness," "Xandulu," "The Menace From Space," "Traders in Treasures," and "Earthspot."

Fair:

"The Man From Ariel," "An Episode on Io," "The Moon Devils," and "The Green Clond of Space."

Poor:

"Children of the Ray" and "The Tone Machine."

When I say that certain were fair or poor, I really mean that they are fair or poor in comparison to the others; in fact I cannot remember reading an ont and out bad story in the magazine. I have been able to secure certain nnmbers from 1929 to the present. In these I have found many fair stories but, as well, there were some really fine ones. The ones that I can think of at the moment as impressing me most are "The Time Conqueror" by L. A. Eshbach, "The Reign of the Star-death" by A. Rowley Hilliard, and "Men with Wings" by Leslie F. Stone. The last of these was in Vol. 1, No. 1 of AIR WONDER. In my opinion, A. Rowley Hilliard and Miss Stone are authors to he encouraged—I should very much welcome stories by them. What has happened to Nathan Schachner these days? His stories dealing with the Technocrats were fine.

The best number of our magazine this year was the March one, closely followed by the April. The only thing that mars the former is the terrible cover. "The Brain-Eaters of Pluto" I greatly enjoyed, and I should be pleased to see more stories of this type in fnture issues.

I am pleased to see the formation of the SCIENCE FICTION LEAGUE. I know it will be successful as it has such excellent aims. Science-fiction is one of the greatest things in the world (if it can he called by such a lowly name as a 'thing') and also one of the strangest. Once you have started reading it you will never stop; it seems very much like a beneficial drug. Still who'd want to stop reading it? When I first started reading it I used to read the stories for the strangeness of them. Then came a period when the plots and ideas seemed commonplace. It was during this period that I realized its value. The amount of science it teaches one is wonderful, and one of its most interesting values is the way it points out the silliness of the world today in many ways. Science-fiction rounds off the general education of anyone. Most people with an ordinary high school education know nothing about astronomy, many classes of biology, geology, and dozens of other sciences which are not taught in any detail except at nniversities. Science-fiction is a second education in itself. An education that is absorbingly interesting, and which is therefore of very great benefit. Unfortunately, it is only readers of science-fiction who realize this, and in this country more than in the U. S. A., I should imagine, it is a terrible task interesting people in it. I am afraid that very great harm indeed has been done pseudo-science-fiction in which rays, robots, gray-bearded scientists who are mad, and who always have beautiful daughters, figure. One of my friends is a firm science-fiction fan, but apart from him and two others who are mildly interested, none of my personal acquaintances think of it seriously. The two I mentioned who are mildly interested used to look upon science-fiction as trash until after much persuasion I managed to get them to read a story or two. They have said nothing against it since. Still, if I am crazy, I am pleased to be crazy in company with such distinguished people as yourself and yonr authors. Anyway, more power to the SFL. My next letter to you will probably contain my completed entrance form.

I think I have said something about most of the things I wished to say, so I will conclude by wishing WONDER STORIES a great future, with greater heights attained than ever before.

MAURICE K. HANSON,
Narborough, England.

(Your classification of stories is interesting and we are glad to see that the "poor" stories are only poor in comparison to the others we print, and are not really poor as science-fiction yarns.

Leslie F. Stone paid us a visit the other day and she promises to favor us with many stories in the future. We have recently accepted two from this gifted author and enjoyably contemplate repeating this act often in the days to come.

You certainly seem to have the right idea abont science-fiction. It is really a secondary scientific education in itself, and an inspiration to experimenters. —*EDITOR.)*

Stories by Wells

Editor, WONDER STORIES:

I have a very good reason for this terrible delay in sending this monthly letter to you. The fact is I have almost stopped everything to read—H. G. Wells's "Seven Famous Novels." Only yesterday have I finished, and as I write their unforgettable memory still rings vividly in my mind. You don't blame me, do you?

Great! WONDERful! That's what I think of Alvin Earl Perry's suggestion. Anyone can join the LEAGUE, but only a comparatively few will show their enthusiasm by trying to pass these tests. This, too, is fair for everyone, even thongh they may have read science-fiction for only a short time; many new readers boast of a set of back issues of WONDER and others. Bring on the tests right away; I can hardly wait!

Now why! Oh why!?—did you, of all the really *good* stories that you could get, publish that one, "The Final Struggle"? It was not so bad, *however*, when you are endeavoring to bring the readers to favor these types, why? *OH, WHY!*—did you pick out this one? I feel like crying to think that as a result we shall perhaps never have the pleasure of these little interesting yarns. To me the story made comprehensible sense, but to others . . . . just gibberish.

Keep up the book reviews, and for heaven's sake change the arrangement of the contents. Where's that Annual? If you don't hurry my finger nails will be ruined.

One last question. When do we have *large size* again! That is something I have always secretly wanted.—*large size?* (My last question mark, but the *biggest* one of them all.) *Vive la* SFL.

DAVID A. KYLE,
Monticello, N. Y.

(We believe that the publishers of the "Seven Famous Novels of H. G. Wells" have certainly done a lot to advance science-fiction—and Wells's stories are science-fiction of the highest type. Many people who buy this book will undouhtedly turn to sciencefictlon as a regnlar diet, though they were not interested in it before.

We have made the First Science Fiction Test cover only the science-fiction published in magazines since 1926, for the most part, and it should not be difficult for those fans who merit the first-class membership.

WONDER STORIES is getting along very well in the small size and we can see no logical reason for returning to the large and cumbersome edition. In fact, the circulation is now larger than it has ever been before, and that is a fact not to be ignored.—*EDITOR.)*

The SPWSSTFM

Editor, WONDER STORIES:

Will you please eal' the attention of your readers to the following announcement:

For long have our fair science-fiction magazines

been defiled! We have stood it long enough, and now the time has come for action. The SPWSSTFM has been organized, and we need your help! Our Society has daringly set forth upon a crusade greater than any ever yet undertaken.

The Society needs your help. We are sure you will help us. If you are in sympathy with our undertaking, simply drop us a postcard, giving your name and address, and say that you will freely lend the prestige of your name for our great cause!

The Society (Society for the Prevention of Wire Staples in STF Magazines) is bound to grow, and some day wield power among publishers and editors. Our motto is: "Pull the Wire Staples Out of STF Magazines!" So please, lend your help. Simply drop a postcard to the address below. We are bound to win!

BOB TUCKER,
Bloomington, Ill.

(We suppose the SPWSSTFM would like us to bind the magazine with paper clips or rubber bands, or perhaps for us to just sell the sheets that make up the magazine four for a nickel, or something.

We regret that we forgot to leave your address on the letter so that you could secure members for your SPWSSTFM—but it is too late now—the magazine has already gone to press.—*EDITOR.)*

Thumbs Down

Editor, WONDER STORIES:

Here I come again, right into your office—just for a little discussion about our mutual interest, our WONDER STORIES.

Perhaps I am a little too interested—and come walking in too often—but I don't mean any harm—I'm only trying to help you—even just a little bit . . . .

That October cover was fine. And Mr. Lenard's "standup" for Paul only helped convince me that after all, Paul *is* supreme. Nuff said . . . .

I am so glad to hear of the coming "Valley of Dreams." Also nuff sed.

The "Thieves from Isot" was well up to the high Binder standard. However, I was disappointed in "The Final Struggle."

Please—let's keep the weird tale out of WONDER STORIES. Once in a while is perfectly satisfactory—but let's not let them slip in too often. Although I considered "The Brain of Ali Kahn" a weird tale, it contained enough science to be called science-fiction, whereas "The Final Struggle" was purely a mediocre weird tale, with no science, with the exception of the fact that the "monster" was synthetic.

Otherwise, it was a perfectly rounded out issue. Glad to notice that "The Reader Speaks" is separate from the advertisements.

And what a corking idea those Stf. degrees. Fine. Fine. Fine.

LEWIS F. TORRANCE,
Winfield, Kan.

(We have certainly been thoroughly convinced that our readers want no more stories like "The Final Struggle" by Francesco Bivona in our October issue, and will avoid that type in the future. During the past year or so we have experimented quite a lot in bringing new types of stories to you, and only one type, the above mentioned, has been turned thumbs down by our readers. You like those of "The End of Tyme" and "Martian Odyssey" kinds, and we will see that you get more of them.—*EDITOR.)*

Wonder a Godsend

Editor, WONDER STORIES:

This is just to express my gratitude for having received the October, 1934, number. I was almost on the verge of a breakdown when I got home one evening but there resting princely on the table was that Godsent lifesaver. Am taking it in heavy doses and beginning to feel like my old self again, thanks to you.

MORRIS MILLER,
Brooklyn, N. Y.

(It seems as though WONDER STORIES has come to be an integral part in the lives of so many of our readers. Your letter indicates that you are one of them. Science-fiction is sustenance to the imaginative mind.—*EDITOR.)*

The Purple Bat

Editor, WONDER STORIES:

Notwithstanding the fact that this letter has the appearance of a movie thriller, I shall attempt to present to yourself, the Editor, and to the comparatively intelligent readers of WONDER STORIES a few concise and distinct opinions of myself. For obvious reasons I prefer to remain anonymous.

In the September issue (1934), the story "The Man from Beyond" written by John Beynon Harris was published. In this interesting narrative Goin, the lecturer in phonetics, said on page 425: "Exactly. Makes you wonder if life isn't a disease after all—a kind of corruption which attacks dying planets; growing more and more vicious in the higher forms." Now I want to refer to a similar theme developed by A. Rowley Hilliard in his story "Death from the Stars" which was published in the October, 1931 issue of WONDER STORIES. The following are excerpts from page 614 of that copy: "Life is a disease"—then—"Exactly. A disease or corruption which afflicts the stagnant matter which is our earth." Note how remarkably these two passages follow each other. Both authors have shown extraordinarily similar thoughts in this stupendous meditation. I am bringing attention to this because not many have stopped to really think about this colossal idea which was developed more fully by Mr. Hilliard.

Soon after Lumen Winter's drawings began to appear, someone remarked that Winter was good on the figure work. As a result everyone said the same thing and even you stated that Winter was to do all of the figure work. What has happened to the readers' powers of observation? Undoubtedly Mr. Winter does the drawing of figures better than any other type of illustrating, *but* they are not something wonderful. Mr. Winter achieves his success because of his faces and inattention to tiny details. His faces are exceptional, due to their imperfection and lifelike characteristics. Paul is in the exact reverse; he draws every face, with little exceptions, a perfect example of art, thus not lifelike. Then too, Mr. Paul accounts for every bit of his drawing space by using insignificant specifications, while on the other hand, Mr. Winter leaves out unnecessary detail with blank space or shading. It is these things that Mr. Winter uses to contrast Mr. Paul's illustrations and to leave the effect of excellent drawing of men. Notice the illustration by him of Dr. Keller's story "The Tree of Evil" in the September WONDER STORIES. In this sketching his figure work is very poor. It is the faces that show his value as an artist, *not* his figures. The young lady in the center reminds me of a wax figure on a hot day. I will say, however, that Mr. Winter in due time will become much better than he is now. His present series are very, very much better than his few of four years ago when he drew in soft pencil. Keep Mr. Winter, but *don't* overestimate him; praise him when the time comes.

I have noticed many letters by Mr. J. H. Hennigar, both in WONDER STORIES and its other two rivals. It is evident that Mr. Hennigar's favorite magazine is another one. In that magazine his letters ring with praise. I do not care, of course, what magazine he prefers, but I should think that this fact would not effect his intelligent reasoning. I am referring to his babyish letter of May's "The Reader Speaks." Because of the fact that Frank R. Paul illustrates for a magazine that is not his favorite, he brands Mr. Paul as "awful," "rotten." Anyone can see his ill-founded logic. Perhaps he will show some common sense that he undoubtedly has, but it does not look like it according to his September criticism.

I trust that WONDER STORIES will continue to improve and that you, the Editor, will find everything favorable to your future plans.

THE PURPLE BAT,
Cleveland, O.

(There is no doubt that the works of Paul and Winter greatly differ, and their technique cannot be compared with each other, but both are real artists and variety is a good thing to have anywhere.

We wonder why you call yourself "The Purple Bat"?—*EDITOR.)*

The Weaker (?) Sex

Editor, WONDER STORIES:

I am so sorry I neglected to get my SCIENCE FICTION LEAGUE certificate until I came under the category of "No. 464."

I wish to ask some questions. In the first place, couldn't some of those LEAGUE lapel buttons be made

into pins, since I have no use whatever for a lapel button.

Where are the feminine scientifiction fans? I don't recall ever having read a letter from a member of the weaker (?) sex in your "Reader Speaks" department.

It is a wonder to me that some writer hasn't taken the nudism idea for one of his stories; they've utilized almost everything else.

I'm sure that others besides myself would like to read of a woman's adventures in space, even if the author had to bring in a man stronger than herself as in the manner of "The Warrior's Husband."

In the September issue I thought that the stories should come in this order:

1. The Man From Beyond
2. Enslaved Brains
3. The Living Galaxy
4. The Tree of Evil

"The Man From Beyond" was interesting and well written and certainly deserves first place. "Enslaved Brains" was good, but did not appeal to my imagination as did the other story. "The Living Galaxy" was probably very good but it just didn't appeal to me. "The Tree of Evil" was good but the reason I put it last was because it seemed to me that it came within the realm of weird fiction. It was more of the type of story that would appear in Weird or Strange Tales.

I wish you could give us one or two more short stories in each issue, as I do not like to read serials until I have every installment.

I ask your pardon for the sloppy manner in which this has been written.

MOLLY ACREMAN,
El Paso, Tex.

(There are plenty of feminine science-fiction fans, though not nearly as many as you will find as readers of other types of literature. We print letters from them regularly in this department. We usually have one or two per month. You will see Virginia Kidd in these columns very often.

You will find that women characters usually play important parts in stories by our feminine authors, such as Lilith Lorraine and Leslie F. Stone.

We don't think that your letter was written in a "sloppy" manner at all.—*EDITOR.)*

Quality First

Editor, WONDER STORIES:

Okay, pal, you win. When I picked up WONDER STORIES and glanced through it, I says to my brother, the doc, I says, "I guess WONDER STORIES is going the way of all good scientifiction mags. Looks like Mr. Gernsback must be losing his grip. What the heck, only four stories!"

But when I sat down and started to read it—great Gooks! you don't need any more than four stories. If you can pick out stories like that right along—and when I saw the announcement for a sequel to "A Martian Odyssey"—well, the verdict's that yer me best friend fer life. I haven't even read all the stories yet. I am impatient to get at the "Brain of Ali Kahn." Hope I'm not disappointed. Then I'd have to write you another letter. "The Fall of the Eiffel Tower" gets better as it progresses. When you consider the fact that translations always lose something, the original must haf been somet'ing svell. And the "Thieves from Isot"—what I've read of it—certainly snapped me out of my grouch in a hurry. Keep it up. I'm behind you.

And while we're on the subject, Gernsback wouldn't be Gernsback without Paul. So, though his work is depreciating a bit, you had better keep him. And Winter is a gold mine; though he did pull one amusing blunder that I haven't found noticed in any of the other letters. Remember his illustration for "The Moon Devils"? The one in which everyone was feverishly bolting plates over the windows to keep the ship's air in as the moon men were smashing them? Well, according to Winter those plates were rectangular slabs of steel with a foot of space between them!

The whole trouble with Paul, I think, is that he is learning to do his work too fast—on a wholesale basis, one might say. Or maybe you're lowering his pay. But, as I say, I'm all for your mag.

And if you find any brickbats (pardon the terminology, please) in this essay, just heave 'em right back at me. I like it. So if you ever feel the need of anyone to argue with or for you, just remember me.

ROBERT L. BARNES,
Williston, N. D.

(We never could see the reason why some of our readers kicked because they thought they were getting less science-fiction per month in WONDER STORIES than in other magazines, or that they would rather have a lot of short stories than a few long ones. As for the amount of material, which do you think is the most important—quantity or quality? Of course you will say quality. Would you rather read an excellent short story or a mediocre novel? Would you rather read the best in science-fiction or the stories we reject, many of which appear in other magazines? We could give you more for your money, all right, but not *better*—in fact, not as good. Quality does not always come in large packages—remember that. As for the lengths of the stories—we have no control over that for the most part. We don't order our stories. We take only the very best we receive—not every "good" story, and we find that we can just keep five or six issues ahead of publication by doing this. In other words, out of all the piles of manuscripts we receive every month, we find just about enough of the superior type to fill an issue. If we practiced what other magazines do, taking every passable story, we would *have* to print a much larger magazine, and perhaps a couple of auxiliary publications. We don't want to do this. We want the name WONDER to remain a symbol for the *superior* type of science-fiction, not the *most* reading matter. Other publishers are satisfied to give you a "lot" for your money. We want to give you your money's "worth." When we find our list of accepted stories growing much faster than we can publish them in the present magazine, and that will be when more authors realize the type of story we want, then we will increase the size of the magazine, and not until then. We have no control over such matters. It is all up to the authors.—*EDITOR.)*

War In Our Stories

Editor, WONDER STORIES:

Please give Paul a pat on the back for his September cover—the vari-colored sky made it look much more natural than the preceding ones. The figures of the Venusian explorers were quite good, too. Paul is getting better and better, even exceeding Winter lately in figure work. I disagree with some readers in giving Winter a cover job. That work was just created for Paul, and all his covers (except one, as far as I can remember) were excellent. You made a mistake in permitting Shneeman to draw the illustration for "Into the Infinitesimal," in the June number. Winter or Saaty could have done much better.

How come, no contests lately? The last was "The Moon Doom" composition, and that was quite a while ago. One soon, if you please. Perhaps like that of AIR WONDER for February, 1930, a story based on the cover drawing.

John Beynon Harris' latest ("The Man From Beyond") elevated him to the level of Schachner and Flagg. Get him to write another one of his interesting time-travel yarns. Remember "Worlds to Barter"?

"The Living Galaxy" had a totally new plot, but I should have preferred a Stranger Club story from Manning. I'd like to see another serial of the adventures of Haworth, Mason, and Bigelow (of "Voyage," and "Wreck of the Asteroid" fame) on Luna or Jupiter.

"The Fall of the Eiffel Tower" is getting off excellently. Much better than "Druso." "Enslaved Brains" was great. Another serial from Mr. Binder.

Can't you get Edmond Hamilton into action again? I'll never forget his "Cities in the Air." You don't seem to be publishing any stories about terrestrial wars of the future any more. There is plenty of room in that field for another good serial like Hamilton's. Spohr's "Final War" was an excellent sample of that type of story, as was F. K. Kelly's "Red April, 1965."

Can you tell me where I can get A. Merritt's sequel to the "Moon Pool," "The Conquest of the Moon Pool"? I've read the former, and naturally hoped to see a sequel.

The complete-serial idea, as typified in "Revolt of the Scientists," and "The Man Who Awoke," doesn't seem to be being developed.

And finally, produce another of E. T. Snook's mas-

(Continued on page 1149)

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Good News for Members of the
SCIENCE FICTION LEAGUE

THE following list of essentials has been prepared for members of the SCIENCE FICTION LEAGUE by the officers at Headquarters.

A FEW WORDS AS TO THE PURPOSE OF THE LEAGUE

The SCIENCE FICTION LEAGUE was founded in February, 1934. The Executive Directors are as follows:

Forrest J. Ackerman, Eando Binder, Jack Darrow, Edmond Hamilton, David H. Keller, M.D., P. Schuyler Miller, Clark Ashton Smith, and R. F. Starzl. Hugo Gernsback, Executive Secretary, Charles D. Hornig, Assistant Secretary.

The SCIENCE FICTION LEAGUE is a membership organization for the promotion of science fiction. There are no dues, no fees, no initiations, in connection with the LEAGUE. No one makes any money from it; no one derives any salary. The only income which the LEAGUE has is from its membership essentials. A pamphlet setting forth the LEAGUE'S numerous aspirations and purposes will be sent to anyone on receipt of a 3c stamp to cover postage.

One of the purposes of the SCIENCE FICTION LEAGUE is to enhance the popularity of science fiction, to increase the number of its loyal followers by converting potential advocates to the cause. To this end, the SCIENCE FICTION LEAGUE supplies members with membership letterheads, envelopes, lapel buttons, and other essentials. As soon as you are enrolled as a member, a beautiful certificate with the LEAGUE'S seal will be sent to you, providing 15c in stamps or coin is sent for mailing and handling charges. However, this will be given free to all those enrolled members who find it possible to call personally at Headquarters for it.

Another consideration which greatly benefits members is that they are entitled to preferential discounts when buying science fiction books from numerous firms who have agreed to allow lower prices to all SCIENCE FICTION LEAGUE members. The book publishers realize that, the more fervid fans there are to boost science fiction, the more business will result therefrom; and a goodly portion of the publishing business is willing, for this reason, to assist SCIENCE FICTION LEAGUE members in increasing their science fiction collections by securing the latest books of this type at discounted prices.

SCIENCE FICTION ESSENTIALS LISTED HERE SOLD ONLY TO SCIENCE FICTION LEAGUE MEMBERS

All the essentials listed on this page are never sold to outsiders. They cannot be bought by anyone unless he has already enrolled as one of the members of the SCIENCE FICTION LEAGUE or signs the blank on this page (which automatically enrolls him as a member, always provided that he is a science fiction enthusiast).

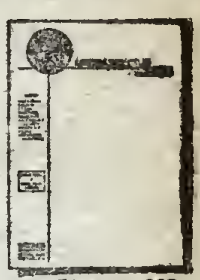
If, therefore, you order any of the science fiction essentials without filling out the blank, or a facsimile (unless you are already enrolled as a LEAGUE member), your money will be returned to you.

Inasmuch as the LEAGUE is international, it makes no difference whether you are a citizen of the United States or any other country. The LEAGUE is open to all.

LEAGUE LETTERHEADS

A beautiful letterhead has been especially designed for members' correspondence. It is the official letterhead for all members of the LEAGUE and is invaluable when it becomes necessary to correspond with other members or with Headquarters.

A—SCIENCE FICTION LEAGUE letterheads, per 100.....Prepaid 50c



A—50c per 100

LEAGUE ENVELOPES

So that letters mailed to members of the LEAGUE can be immediately recognized, special envelopes that harmonize with the letterheads have been printed.

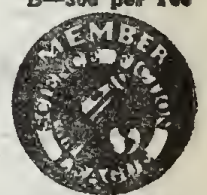
B—SCIENCE FICTION LEAGUE envelopes, per 100.....Prepaid 50c

B—50c per 100

LEAGUE SEALS

These seals, or stickers, are printed in three colors and measure 1¼" in diameter, and are gummed on one side. They are used by members to affix to stationery, letterheads, envelopes, postal cards and the like. The seals signify that you are a member of the SCIENCE FICTION LEAGUE. Sold in lots of 25's or multiples thereof.

C—SCIENCE FICTION LEAGUE seals, per 25.....Prepaid 15c



C—15c for 25

LEAGUE LAPEL BUTTON

This beautiful button is made in hard enamel in four colors—red, white, blue and gold. It measures ¾" in diameter. By wearing this button, other members will recognize you. Many friends will perhaps also want to join the LEAGUE. The button must be seen to be appreciated.

D—SCIENCE FICTION LEAGUE lapel button .....Prepaid 35c

DD—SCIENCE FICTION LEAGUE lapel button, like the one described above, but in solid gold.....Prepaid $2.50

D—35c each

If you do not wish to mutilate this magazine, any number of applications will be supplied upon request.

SCIENCE FICTION LEAGUE, 99 Hudson Street, New York, N.Y.

Application for Membership
SCIENCE FICTION LEAGUE

SCIENCE FICTION LEAGUE, 99 Hudson Street, New York, N. Y.

I, the undersigned, herewith desire to apply for membership in the SCIENCE FICTION LEAGUE. In joining the LEAGUE, I understand that I am not assessed for membership and that there are no dues and no fees of any kind. I pledge myself to abide by all the rules and regulations of the SCIENCE FICTION LEAGUE, which rules you are to send me on receipt of this application.

I belong to the following class (put an X in correct space): ( ) Professional; ( ) Business; ( ) Student; ( ) ..... (Please print information)

Name.....Age.....

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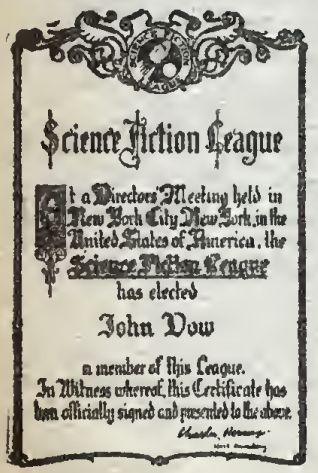
I enclose 15c, for postage and handling, for my Membership Certificate.



FREE CERTIFICATE

To the left is an illustration of the certificate provided all members of the SCIENCE FICTION LEAGUE. It is sent to all members upon receipt of 15c in stamps to cover mail charges.

WONDER STORIES is the voice of the SCIENCE FICTION LEAGUE—a monthly department appears in the magazine.

SCIENCE FICTION LEAGUE, 99 Hudson Street, New York, N. Y.
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THE SCIENCE FICTION LEAGUE

(Continued from page 1136)

CORRESPONDENTS

All members are free to enter their names upon this list, telling just who they would like to write to (ages and sex), where they should live, and perhaps what they should be interested in.

This correspondence list is for members of the SCIENCE FICTION LEAGUE and those entered are warned against questionable letters they may receive from outsiders. If your entry does not bring the results you desire, make your next one take in a wider field, either in ages, locality, or hobbies. By notifying Headquarters when the issue appears containing your name, you may have it repeated the second month following, and by doing this every two months, have the entry six times per year. However, you will probably not wish to do this, for you are likely to secure all the correspondents you desire with the first insertion.

LeRoy Christian Bashore, 310 N. 7th St., Lebanon, Pa., Member Number 567, wishes to correspond with young men and girls on any subject. He is interested in science, hypnotism, and chemistry.

Harold R. Garrett, 1302 E. Broadway, Sedalia, Mo., Member Number 532, would like to write to collectors of science-fiction and fantasy fiction, and those who like time and interplanetary stories.

George Gordon Clark, 8709 Fifteenth Ave., Brooklyn, N. Y., Member Number One, wants to correspond with both sexes interested in biology, transportation in the future, and the propelling forces used, also those interested in collecting back issues of science-fiction magazines.

Mortimer Weisinger, 4727 Hudson Blvd., North Bergen, N. J., Member Number 73, would like to hear from our lady members, over thirty-five years of age, interested in writing.

Forrest J. Ackerman, 530 Staples Ave., San Francisco, Calif., Honorary Member Number One, would appreciate contact with our members who live in France and Germany to exchange movie magazines and correspond about scientifilms in their countries.

William A. Dryson, 39 Arnold St., Birkby, Huddersfield, Yorks., England, Member Number 615, is greatly interested in astronomy and chemistry and would like to write to anyone about these subjects.

Kenneth B. Pritchard, 82 Second St., Pittsfield, Mass., Member Number 226, would like to hear from anyone connected with the rocket organizations who know what is going on. He is a member of the American Rocket Society.

SUGGESTIONS

Here are a few advance suggestions of how you can help the SCIENCE FICTION LEAGUE:

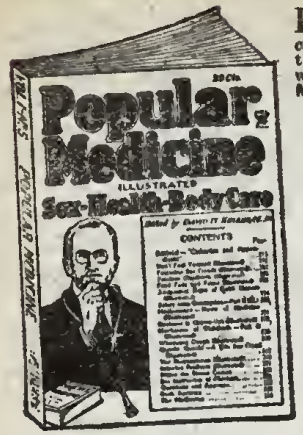
(1) If you wish to form a local Chapter of the LEAGUE, get a newspaper to print a notice in the society or club section. They will do this free of charge and it will aid you in securing many members.

(2) Send to Headquarters all the suggestions that you believe will improve the SCIENCE FICTION LEAGUE and its activities. You may have some valuable ideas that will greatly aid the cause of science-fiction. This department will appear monthly in the magazine and will be used as the voice of the members and executives, so do not hesitate to use it freely.

(3) If you are a student in high school or college, try to form a Chapter of the LEAGUE in the building, with students as members. Most educational institutions allow for clubs of all sorts and would be pleased to harbor one more, especially one with standards as high as the SCIENCE FICTION LEAGUE. These school Chapters will be treated in Headquarters as any other Chapter. In order to form a Chapter of the LEAGUE, send your name to us with those of all other members who wish to form the Chapter and the name under which the Chapter will be known. We will send you an officially signed certificate, confirming the existence of the Chapter with its number.

(Continued on page 1147)

KNOW THYSELF!



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THE SCIENCE FICTION LEAGUE

(Continued from page 1145)

(4) Try to write editorials propounding the merits of science-fiction in general and place them in your local newspapers. Stress the fact that science-fiction is educational and broadens the minds of the readers.

(5) Study science-fiction carefully and form a series of conclusions in your mind as to its merits and accomplishments. Organize your ideas so that you can talk freely and convincingly to potential followers on the subject. Be able to tell at a moment's notice just what it is and why you are an enthusiastic advocate. This, with Suggestion Two, is very important to the purpose of the LEAGUE. All members who are instrumental in securing any special attention to the LEAGUE will receive due acknowledgment and will find that it will be profitable to them to be so mentioned.

Rome was not built in a day, we have often been told, and the same can be said for the SCIENCE FICTION LEAGUE. Organized less than a year ago, it has not had time to develop as yet. Plans will materialize as we go along. The LEAGUE has one prime purpose—to spread the worthy gospel of science-fiction. That is the basis of the LEAGUE, and its goal will not be reached until everyone knows of science-fiction and respects it as the most powerful literary force in the world. We can hardly hope for this for a long time to come, but every scheme, plan, or idea that will aid us in reaching that goal is welcome. New ones will be broached every month by the executives and members—will you do your part? We do not expect every member to have an inexhaustible reservoir of ideas, but we will appreciate all suggestions offered.

If you have not as yet joined the LEAGUE and wish to do so, you will find application blanks in this department.

MOVIE REVIEW

GOLD, a UFA picture produced in Germany, with Hans Albers, Brigitte Helm, Michael Bohnen, and Lien Deyers. A science-fiction fantasy.

Professor Achenbach discovers how to turn lead into gold. He has neither greed nor lust, but is merely a scholar seeking for knowledge. He has awe-inspiring apparatus for throwing the rays upon the lead, changing the atoms to gold. One of Achenbach's assistants, Becker, is paid to change the lead for another metal. During the experiment, this metal does not turn into gold but explodes, killing Achenbach and Becker, but Holk, the other assistant, survives after being given a blood transfusion from his fiancée, Margit.

After Holk is back to normal, he is offered a well-paid position with John Wills, a big Scotch miner, in his laboratory. He finds that Wills had stolen the secret of turning lead into gold from Achenbach, and had the scientist killed. Holk works to avenge, though making Wills believe that he is all on his side.

Meanwhile, Florence, Wills's daughter, falls in love with Holk, though he does not return her affection, being true to Margit.

The story moves on rather slowly, until Holk finally tells the men working for Wills about his crime, and the men turn against the Scotchman. The news that Wills had a method of turning lead into gold gets into the press, and a panic ensues throughout the world, due to the expected flooding of the market with gold, which would soon be practically worthless. To avoid the destruction of the money markets of the world and to avenge the death of Achenbach, Holk tampers with the mechanism until the entire apparatus, gigantic though it is, will explode in a few minutes. The monstrous doors to the secret laboratory are closed just in time, and the only one trapped is Wills, who would not leave his atomic transformer. Upon exploding, the ocean rushes in from above (the laboratory was under the sea) and the threat to the world was over.

UFA once more has turned out a masterful scientifilm fantasy—a very popular science-fiction theme has at last been put on the screen.

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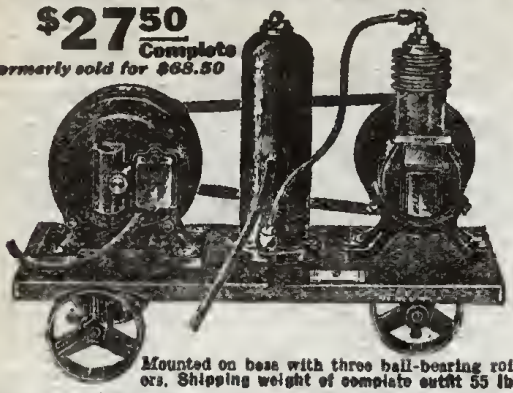

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Price of complete outfit with gun, $37.50
Price of outfit without motor, $30.00
Price of DeVilbiss Gun, $5.95 alone
Price of Filter Tank, $4.25 alone
Price of Compressor, $7.50 alone

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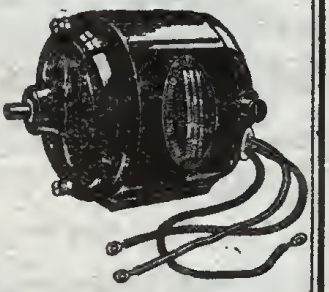

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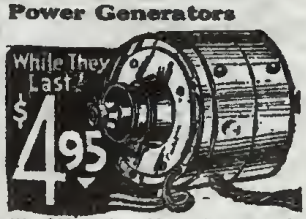

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Get a copy of SEXOLOGY on any newsstand, or, if your dealer cannot supply you, send 25c cash or stamps for current issue.

THE READER SPEAKS

(Continued from page 1142)

terpieces, such as "Traders in Treasures." That was as good as "Why the Heavens Fell."

GEORGE HERBIG,
Los Angeles, Calif.

P. S. I meant to tell you that even the radio has gone interplanetary. KHJ, Los Angeles, is starting a mystery serial of a flight to the moon. For anyone that would like to listen, it is on station KHJ, Los Angeles, 900 kilocycles, every Monday, Tuesday, and Wednesday at 7.45 p. m., Pacific time.

(Don't get the idea that we object to the principle of war in stories—it is not exactly that. It so happens that all stories of wars that we have yet seen are extremely hackneyed and do not fit in under our new policy. It is the same old thing rehashed—one country or league planning to conquer the world, etc. There is nothing new there. However, if we ever get a good science-fiction war story that outlines something original, we will not fail to publish it.

We understand that A. Merritt's "Moon Pool" stories are out of print. The book consists of the original novelette and its sequel, "The Conquest of the Moon Pool," under the one title. You will not find the sequel as a separate book.

Epaminondas T. Snooks, D. T. G., has just had a breakdown under our bombardment of third degree, and confessed that he is about to write another story for us, probably to be entitled "The Return of the Gods," and which will be of novelette length. Let's hope it is forthcoming very soon. One reader has suggested that D. T. G. stands for Death's Too Good. However, Snooks has never told us what it really means, if, indeed, it means anything at all.—*EDITOR.)*

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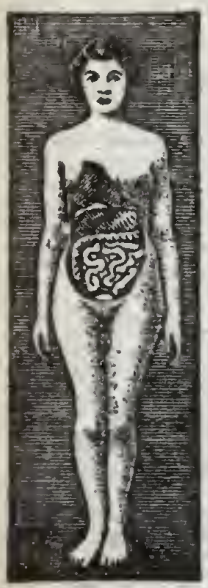

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All plates (one foot high) are printed in actual natural colors.

Thus far, plates such as these presented here have been so high in price as to be inaccessible to the public. Our plan in producing these charts is to make them available to every adult person.

The book is 14 inches high and 6½ inches wide, contains twelve full-page color plates and twelve text pages illustrated with fifty photographs and drawings, made from actual photographs, and all organs and parts of the human body—male and female—are shown in great detail in natural colors.

Opposite each page, an explanatory text is provided, illustrated with photographs and drawings to show in detail the different organs and other features of the human body. The book is recommended for nurses, art students, for lawyers for use in litigations, lecturers, physical culturists, hospitals, sanitariums, schools, colleges, gymnasiums, life insurance companies, employees' health departments, etc.

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CLASSIFIED ADVERTISEMENTS

Advertisements in this section are inserted at the cost of twelve cents per word for each insertion— name, initials and address each count as one word. Cash should accompany all classified advertisements unless placed by a recognized advertising agency. No less than ten words are accepted. Advertising for the March, 1935, issue should be received not later than January 5.

STAMPS

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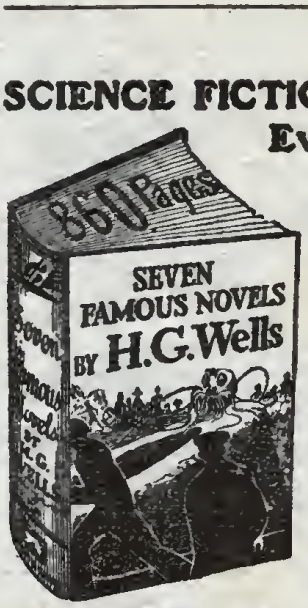

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97W HUDSON STREET NEW YORK

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BACK NUMBERS of Wonder Stories and Amazing, monthly 25c, quarterly, 45c. Amazing Annual, $1.50. E. G. Walton, 80, Clarence Road, Clapton, London, E. 5, England.

THE FANTASY FAN is a fan magazine for lovers of the fantastic. We are now estahlished and well into our second year. Here you will find articles, columns, departments, items of interest, hiographies (all of a fantastic nature) by such prominent authors as Clark Ashton Smith and Eando Binder, besides the other leading authors of fantasy in the country and the world's most active science-fiction and weird tale fans. Also poetry and brand new short stories. If you are a lover of fantastic literatnre, you should join the throng of loyal fans that have supported us this past year and a half—$1.00 a year, 10c per copy. Edited by the Managing Editor of WONDER STORIES. The Fantasy Fan, 137 W. Grand St., Elizabeth, N. J.

BOOKS: "Messiah of the Cylinder;" others by Merritt, Taine, etc.; scientifiction magazines; excerpts: low prices. Lyheck, 18431 Galway Ave., Hollis, New York.

"HOW TO WRITE a Science Fiction Story" and "Celehrities I've Met"—information on science-fiction notables. Both for 10c. Charles D. Hornig, 137 W. Grand St., Elizabeth, N. J.

FOR SALE

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WANTED

SCIENCE WONDER, June 1929 to May 1930; Wonder Stories, Jnne 1930 to Dec. 1931; Amazing Stories, Apr. 1926 to May 1929. Must he in perfect condition, no pages or covers missing—solid issues. George Gordon Clark, 8709 Fifteenth Ave., Brooklyn, N. Y.

FAMOUS science-fiction classics you want to sell or trade. Donald Allgeier, 707 E. Madison, Springfield, Mo.

WEIRD TALES for Angust 1926, also the covers of certain issues, also Amazing covers. What do you want for them? Charles D. Hornig, 137 W. Grand St., Elizabeth, N. J.

BACK ISSUES Weird Tales and Ghost Stories magazines. J. Robinsky, 241 Lincoln Ave., Elizabeth, N. J.

EXCHANGE

CLOTH-BOUND Smithsonian Reports, 1919-1932 for science-fiction magazines, books. Steven Fogaris, 28 East Monroe, Passaic, New Jersey.

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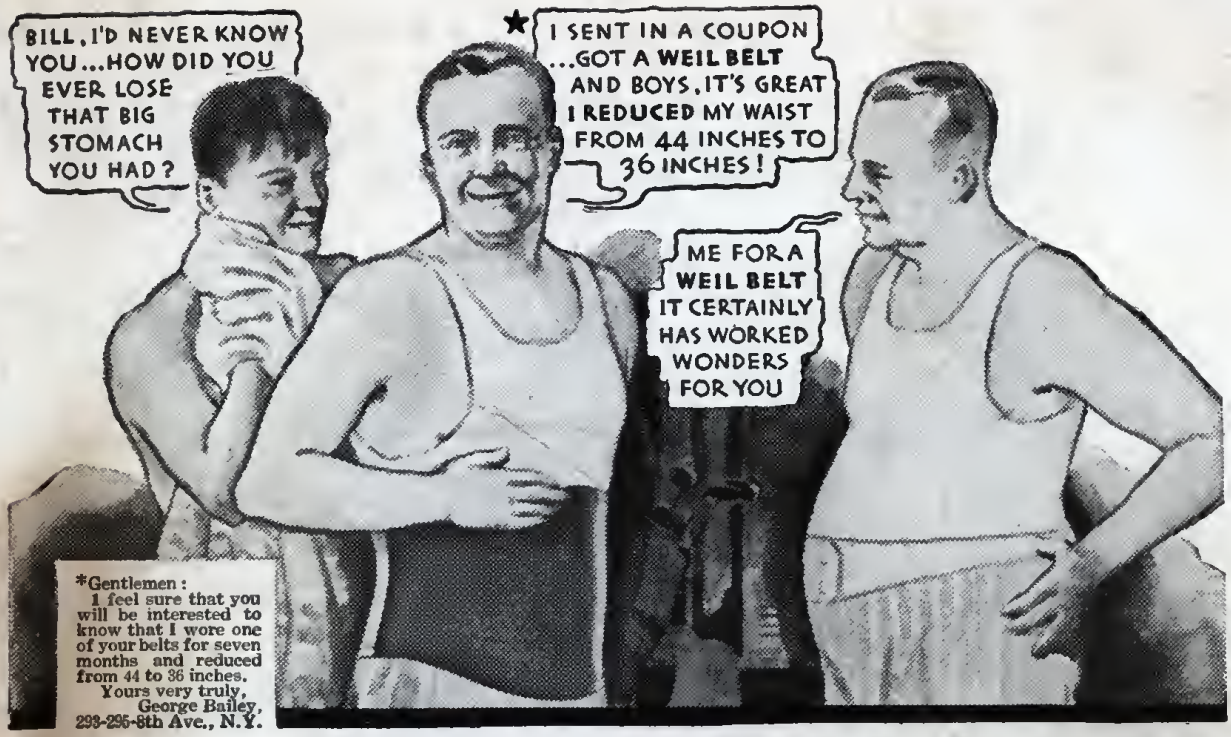

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DON'T BE KIDDED any longer about that "bay window" of yours! The Weil Belt will take inches off that paunchy waistline...3 inches in 10 days to be exact...or it won't cost you a red cent!

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The Midwest 36-page catalog pictures a complete line of beautiful, artistic de luxe console and chassis in four colors. Write for new FREE catalog today!

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